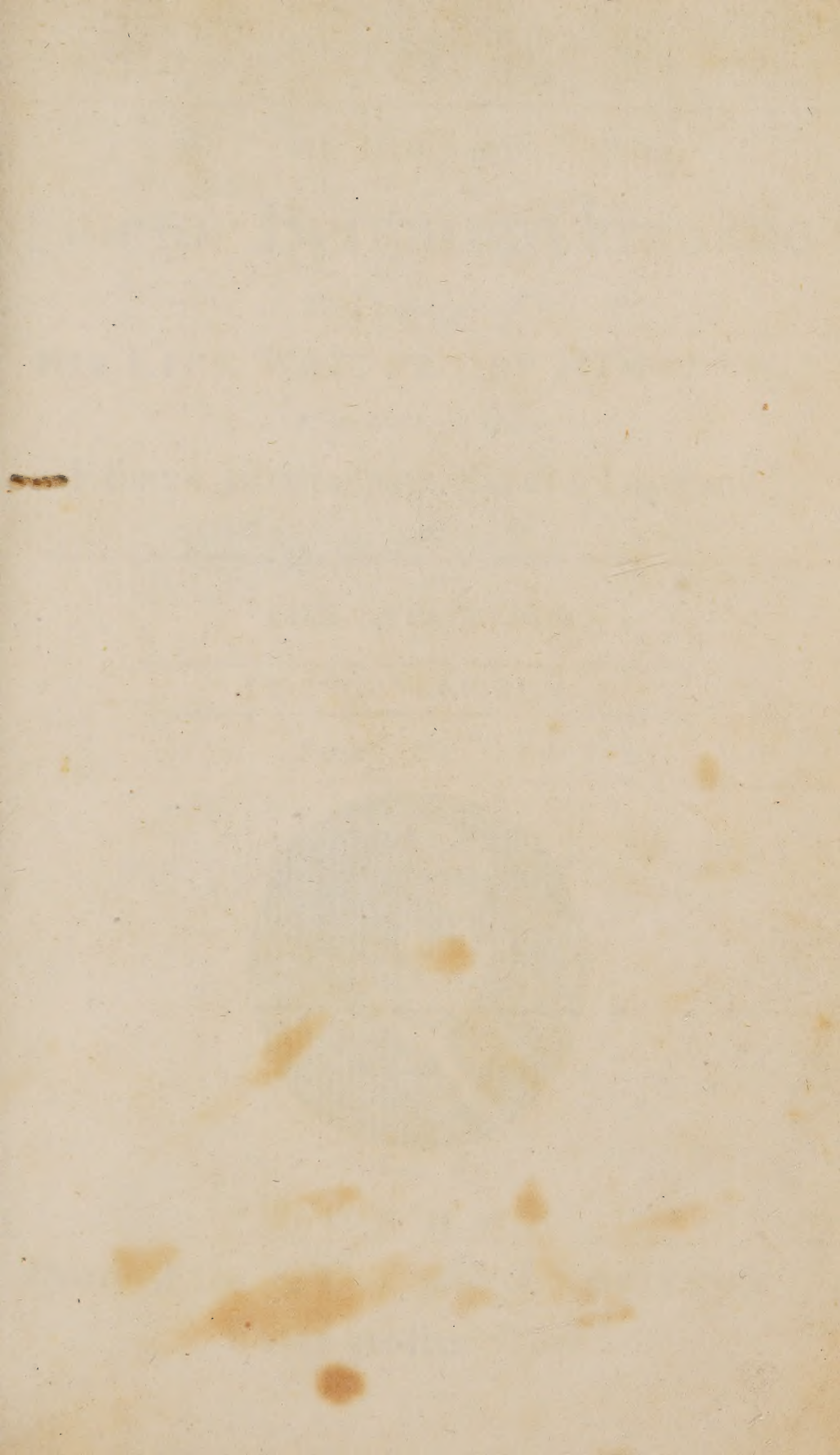




23,44 2/B/2

B. xxiv. Fra

[c. 1793]



WORKS

of the late

Doctor Benjamin Franklin:

Consisting of

HIS LIFE WRITTEN BY HIMSELF,

together with

Essays, Humorous, Moral & Literary,

Chiefly in the Manner of

THE SPECTATOR.

IN TWO VOLUME S.

THIRD EDITION.

Vol. II.

L O N D O N:

Printed for G. G. J. and J. ROBINSON,

Pater-noster Row.



CONTENTS

OF

VOL. II.

	Page
<i>ON</i> Early Marriages - -	1
<i>On</i> the Death of his Brother, Mr. John Franklin - -	6
<i>To</i> the late Doctor Mather of Boston	9
<i>The Whistle, a true Story; written</i> <i>to his Nephew</i> - -	14
<i>A</i> Petition of the Left Hand -	18
<i>The</i> handsome and deformed Leg -	21
<i>Conversation</i> of a Company of Ephe- <i>meræ; with the Soliloquy of one</i> <i>advanced in Age</i> - -	22
<i>Morals</i> of Chess - -	33
<i>The</i> Art of procuring pleasant Dreams	43
<i>Advice</i> to a young Tradesman -	55
VOL. II. A	Necessary

CONTENTS.

	Page
<i>Necessary Hints to those that would be rich - - -</i>	60
<i>The Way to make Money plenty in every Man's Pocket - -</i>	63
<i>An æconomical Project - -</i>	66
<i>On modern Innovations in the English Language, and in Printing -</i>	78
<i>An Account of the highest Court of Judicature in Pennsylvania, viz. the Court of the Press - -</i>	91
<i>Paper : a Poem - -</i>	101
<i>On the Art of Swimming - -</i>	105
<i>New Mode of Bathing - -</i>	112
<i>Observations on the generally prevail- ing Doctrines of Life and Death</i>	115
<i>Precautions to be used by those who are about to undertake a Sea Voyage</i>	120
<i>On Luxury, Idleness, and Industry -</i>	132
<i>On the Slave Trade - -</i>	143
<i>Observations on War - -</i>	151
<i>On the Impress of Seamen - -</i>	155
<i>On the Criminal Laws, and the Practice of Privateering -</i>	164
<i>Remarks</i>	

CONTENTS.

	Page
<i>Remarks concerning the Savages of North America</i> - -	181
<i>To Mr. Dubourg, concerning the Dissensions between England and America</i> - - -	198
<i>Preference of Bows and Arrows in War to Fire-arms</i> - -	201
<i>A Comparison of the Conduct of the Ancient Jews, and of the Antifederalists in the United States of America</i> - - -	206
<i>The internal State of America: being a true Description of the Interest and Policy of that vast Continent</i> - - -	217
<i>Information to those who would remove to America</i> - -	230
<i>Final Speech of Dr. Franklin in the late Federal Convention</i> - -	252
<i>Sketch of an English School</i> - -	258
<i>On the Theory of the Earth</i> -	274
<i>Loose Thoughts on an universal Fluid</i>	284

CONTENTS

Family of the ...

...

...

...

...

...

...

...

...

...

...

...

...

...

...

...

...

E S S A Y S,
HUMOROUS, MORAL, AND
LITERARY; &c.

ON EARLY MARRIAGES.

TO JOHN ALLEYNE, ESQ.

DEAR JACK,

YOU desire, you say, my impartial thoughts on the subject of an early marriage, by way of answer to the numberless objections that have been made by numerous persons to your own. You may remember, when you consulted me on the occasion, that I thought youth on both sides to be no objection. Indeed,

VOL. II.

B

from

from the marriages that have fallen under my observation, I am rather inclined to think, that early ones stand the best chance of happiness. The temper and habits of the young are not yet become so stiff and uncomplying, as when more advanced in life; they form more easily to each other, and hence many occasions of disgust are removed. And if youth has less of that prudence which is necessary to manage a family, yet the parents and elder friends of young married persons are generally at hand to afford their advice, which amply supplies that defect; and by early marriage, youth is sooner formed to regular and useful life; and possibly some of those accidents or connections, that might have injured the constitution, or reputation, or both, are thereby happily prevented. Particular circumstances of particular persons may possibly sometimes make it prudent to delay entering
into

into that state ; but in general, when nature has rendered our bodies fit for it, the presumption is in nature's favour, that she has not judged amiss in making us desire it. Late marriages are often attended, too, with this further inconvenience, that there is not the same chance that the parents shall live to see their offspring educated. " Late children," says the Spanish proverb, " are early " orphans." A melancholy reflection to those whose case it may be ! With us in America, marriages are generally in the morning of life ; our children are therefore educated and settled in the world by noon ; and thus, our business being done, we have an afternoon and evening of cheerful leisure to ourselves, such as our friend at present enjoys. By these early marriages we are blessed with more children ; and from the mode among us, founded by nature, of every mother suckling and nursing her own

B 2

child,

child, more of them are raised. Thence the swift progress of population among us, unparalleled in Europe. In fine, I am glad you are married, and congratulate you most cordially upon it. You are now in the way of becoming a useful citizen; and you have escaped the unnatural state of celibacy for life—the fate of many here, who never intended it, but who having too long postponed the change of their condition, find, at length, that it is too late to think of it, and so live all their lives in a situation that greatly lessens a man's value. An odd volume of a set of books bears not the value of its proportion to the set. What think you of the odd half of a pair of scissars? It can't well cut any thing; it may possibly serve to scrape a trencher.

Pray make my compliments and best wishes acceptable to your bride. I am old and heavy, or I should ere this have presented them in person. I shall make
but

but small use of the old man's privilege, that of giving advice to younger friends. Treat your wife always with respect; it will procure respect to you, not only from her, but from all that observe it. Never use a slighting expression to her, even in jest; for slights in jest, after frequent bandyings, are apt to end in angry earnest. Be studious in your profession, and you will be learned. Be industrious and frugal, and you will be rich. Be sober and temperate, and you will be healthy. Be in general virtuous, and you will be happy. At least, you will, by such conduct, stand the best chance for such consequences. I pray God to bless you both! being ever your affectionate friend,

B. FRANKLIN.

ON THE DEATH OF HIS BROTHER,
Mr. JOHN FRANKLIN.

TO MISS HUBBARD.

I CONDOLE with you. We have lost a most dear and valuable relation. But it is the will of God and nature, that these mortal bodies be laid aside, when the soul is to enter into real life. This is rather an embryo state, a preparation for living. A man is not completely born until he be dead. Why then should we grieve that a new child is born among the immortals, a new member added to their happy society? We are spirits. That bodies should be lent us, while they can afford us pleasure, assist us in acquiring knowledge,
or

or doing good to our fellow-creatures, is a kind and benevolent act of God. When they become unfit for these purposes, and afford us pain instead of pleasure, instead of an aid become an incumbrance, and answer none of the intentions for which they were given, it is equally kind and benevolent that a way is provided by which we may get rid of them. Death is that way. We ourselves, in some cases, prudently choose a partial death. A mangled painful limb, which cannot be restored, we willingly cut off. He who plucks out a tooth parts with it freely, since the pain goes with it: and he who quits the whole body parts at once with all pains, and possibilities of pains and diseases, it was liable to, or capable of making him suffer.

Our friend and we were invited abroad on a party of pleasure, which is

to last for ever. His chair was ready first; and he is gone before us. We could not all conveniently start together: and why should you and I be grieved at this, since we are soon to follow, and know where to find him?

Adieu.

B. FRANKLIN.

TO THE LATE

DOCTOR MATHER OF BOSTON.

REV. SIR,

I RECEIVED your kind letter, with your excellent advice to the people of the United States, which I read with great pleasure, and hope it will be duly regarded. Such writings, though they may be lightly passed over by many readers, yet, if they make a deep impression on one active mind in a hundred, the effects may be considerable.

Permit me to mention one little instance, which, though it relates to myself, will not be quite uninteresting to you. When I was a boy, I met with a book entitled "Essays to do good," which I think was written by your father. It had been so little regarded by a former possessor,

possessor, that several leaves of it were torn out; but the remainder gave me such a turn of thinking, as to have an influence on my conduct through life: for I have always set a greater value on the character of a doer of good, than any other kind of reputation; and if I have been, as you seem to think, a useful citizen, the public owes the advantage of it to that book.

You mention your being in your seventy-eighth year. I am in my seventy-ninth. We are grown old together. It is now more than sixty years since I left Boston; but I remember well both your father and grandfather, having heard them both in the pulpit, and seen them in their houses. The last time I saw your father was in the beginning of 1724, when I visited him after my first trip to Pennsylvania. He received me in his library; and, on my taking leave, shewed me a shorter way
out

out of the house, through a narrow passage, which was crossed by a beam overhead. We were still talking as I withdrew, he accompanying me behind, and I turning partly towards him, when he said hastily, "Stoop, stoop!" I did not understand him till I felt my head hit against the beam. He was a man who never missed any occasion of giving instruction; and upon this he said to me: "You are young, and have the world before you: stoop as you go through it, and you will miss many hard thumps." This advice, thus beat into my head, has frequently been of use to me; and I often think of it, when I see pride mortified, and misfortunes brought upon people by their carrying their heads too high.

I long much to see again my native place; and once hoped to lay my bones there. I left it in 1723. I visited it in 1733, 1743, 1753, and 1763; and in

1773

1773 I was in England. In 1775 I had a sight of it, but could not enter, it being in possession of the enemy. I did hope to have been there in 1783, but could not obtain my dismissal from this employment here; and now I fear I shall never have that happiness. My best wishes however attend my dear country, "*Esto perpetua!*" It is now blessed with an excellent constitution: may it last for ever!

This powerful monarchy continues its friendship for the United States. It is a friendship of the utmost importance to our security, and should be carefully cultivated. Britain has not yet well digested the loss of its dominion over us; and has still at times some flattering hopes of recovering it. Accidents may increase those hopes, and encourage dangerous attempts. A breach between us and France would infallibly bring the English again upon our backs: and yet
we

we have some wild beasts among our countrymen, who are endeavouring to weaken that connection.

Let us preserve our reputation, by performing our engagements; our credit, by fulfilling our contracts; and our friends, by gratitude and kindness: for we know not how soon we may again have occasion for all of them.

With great and sincere esteem,

I have the honour to be,

Reverend Sir,

Your most obedient and
most humble servant,

PASSY, May 12, }
1784. }

B. FRANKLIN.

THE WHISTLE :

A TRUE STORY.

WRITTEN TO HIS NEPHEW.

WHEN I was a child, at seven years old, my friends, on a holiday, filled my pocket with coppers. I went directly to a shop where they sold toys for children; and being charmed with the sound of a *whistle* that I met by the way in the hands of another boy, I voluntarily offered him all my money for one. I then came home, and went whistling all over the house, much pleased with my *whistle*, but disturbing all the family. My brothers, and sisters, and cousins, understanding the bargain I had made, told me I had given four times as much for it as it was worth. This put me in mind what good things I might have bought

bought with the rest of the money ; and they laughed at me so much for my folly, that I cried with vexation ; and the reflection gave me more chagrin than the *whistle* gave me pleasure.

This however was afterwards of use to me, the impression continuing on my mind ; so that often, when I was tempted to buy some unnecessary thing, I said to myself, *Don't give too much for the whistle* ; and so I saved my money.

As I grew up, came into the world, and observed the actions of men, I thought I met with many, very many, who *gave too much for the whistle*.

When I saw any one too ambitious of court favour, sacrificing his time in attendance on levees, his repose, his liberty, his virtue, and perhaps his friends, to attain it, I have said to myself, *This man gives too much for his whistle*.

When I saw another fond of popularity, constantly employing himself in political

litical bustles, neglecting his own affairs; and ruining them by that neglect: *He pays, indeed, says I, too much for his whistle.*

If I knew a miser, who gave up every kind of comfortable living, all the pleasure of doing good to others, all the esteem of his fellow-citizens, and the joys of benevolent friendship, for the sake of accumulating wealth; *Poor man!* says I, *you do indeed pay too much for your whistle.*

When I meet a man of pleasure sacrificing every laudable improvement of the mind, or of his fortune, to mere corporeal sensations; *Mistaken man,* says I, *you are providing pain for yourself, instead of pleasure: you give too much for your whistle.*

If I see one fond of fine clothes, fine furniture, fine equipages, all above his fortune, for which he contracts debts, and ends his career in prison; *Alas,* says I,
he

he has paid dear, very dear, for his whistle.

When I see a beautiful, sweet-tempered girl married to an ill-natured brute of a husband: *What a pity it is, says I, that she has paid so much for a whistle!*

In short, I conceived that great part of the miseries of mankind were brought upon them by the false estimate they had made of the value of things, and by their giving too much for their *whistles*.

A P E T I T I O N

TO THOSE WHO HAVE THE SUPERINTENDENCY
OF EDUCATION.

I ADDRESS myself to all the friends of youth, and conjure them to direct their compassionate regards to my unhappy fate, in order to remove the prejudices of which I am the victim. There are twin sisters of us: and the two eyes of man do not more resemble, nor are capable of being upon better terms with each other, than my sister and myself, were it not for the partiality of our parents, who make the most injurious distinctions between us. From my infancy, I have been led to consider my sister as a being of a more elevated rank. I was suffered to grow up without the least instruction, while nothing was spared in her education.

She

She had masters to teach her writing, drawing, music, and other accomplishments; but if by chance I touched a pencil, a pen, or a needle, I was bitterly rebuked: and more than once I have been beaten for being awkward, and wanting a graceful manner. It is true, my sister associated me with her upon some occasions; but she always made a point of taking the lead, calling upon me only from necessity, or to figure by her side.

But conceive not, Sirs, that my complaints are instigated merely by vanity—No; my uneasiness is occasioned by an object much more serious. It is the practice in our family, that the whole business of providing for its subsistence falls upon my sister and myself. If any indisposition should attack my sister—and I mention it in confidence, upon this occasion, that she is subject to the gout, the rheumatism, and cramp, without making mention of other accidents—what would be the fate

of our poor family? Must not the regret of our parents be excessive, at having placed so great a difference between sisters who are so perfectly equal? Alas! we must perish from distress: for it would not be in my power even to scrawl a suppliant petition for relief, having been obliged to employ the hand of another in transcribing the request which I have now the honour to prefer to you.

Condescend, Sirs, to make my parents sensible of the injustice of an exclusive tenderness, and of the necessity of distributing their care and affection among all their children equally.

I am, with a profound respect,

SIRS,

Your obedient servant,

THE LEFT HAND.

THE

HANDSOME AND DEFORMED LEG.

THERE are two sorts of people in the world, who, with equal degrees of health and wealth, and the other comforts of life, become, the one happy, and the other miserable. This arises very much from the different views in which they consider things, persons, and events; and the effect of those different views upon their own minds.

In whatever situation men can be placed, they may find conveniences and inconveniences: in whatever company, they may find persons and conversation more or less pleasing: at whatever table, they may meet with meats and drinks of better and worse taste, dishes better and

worse dressed: in whatever climate, they will find good and bad weather: under whatever government, they may find good and bad laws, and good and bad administration of those laws: in whatever poem, or work of genius, they may see faults and beauties: in almost every face, and every person, they may discover fine features and defects, good and bad qualities.

Under these circumstances, the two sorts of people above mentioned fix their attention; those who are disposed to be happy, on the conveniences of things, the pleasant parts of conversation, the well dressed dishes, the goodness of the wines, the fine weather, &c. and enjoy all with cheerfulness. Those who are to be unhappy, think and speak only of the contraries. Hence they are continually discontented themselves, and, by their remarks, sour the pleasures of society, offend personally many people, and make themselves

selves every where disagreeable. If this turn of mind was founded in nature, such unhappy persons would be the more to be pitied. But as the disposition to criticise, and to be disgusted, is, perhaps, taken up originally by imitation, and is, unawares, grown into a habit, which, though at present strong, may nevertheless be cured, when those who have it are convinced of its bad effects on their felicity; I hope this little admonition may be of service to them, and put them on changing a habit, which, though in the exercise it is chiefly an act of imagination, yet has serious consequences in life, as it brings on real griefs and misfortunes. For as many are offended by, and nobody loves, this sort of people; no one shows them more than the most common civility and respect, and scarcely that; and this frequently puts them out of humour, and draws them into disputes

and contentions. If they aim at obtaining some advantage in rank or fortune, nobody wishes them success, or will stir a step, or speak a word, to favour their pretensions. If they incur public censure or disgrace, no one will defend or excuse, and many join to aggravate, their misconduct, and render them completely odious. If these people will not change this bad habit, and condescend to be pleased with what is pleasing, without fretting themselves and others about the contraries, it is good for others to avoid an acquaintance with them; which is always disagreeable, and sometimes very inconvenient, especially when one finds oneself entangled in their quarrels.

An old philosophical friend of mine was grown, from experience, very cautious in this particular, and carefully avoided any intimacy with such people. He had, like other philosophers, a thermometer

mometer to show him the heat of the weather; and a barometer, to mark when it was likely to prove good or bad; but there being no instrument invented to discover, at first sight, this unpleasing disposition in a person, he, for that purpose, made use of his legs; one of which was remarkably handsome, the other, by some accident, crooked and deformed. If a stranger, at the first interview, regarded his ugly leg more than his handsome one, he doubted him. If he spoke of it, and took no notice of the handsome leg, that was sufficient to determine my philosopher to have no further acquaintance with him. Every body has not this two-legged instrument; but every one, with a little attention, may observe signs of that carping, fault-finding disposition, and take the same resolution of avoiding the acquaintance of those infected with it. I therefore advise those critical, querulous,

rulous, discontented, unhappy people, that if they wish to be respected and beloved by others, and happy in themselves, they should *leave off looking at the ugly leg.*

CONVERSATION

OF A

COMPANY OF EPHEMERÆ;

WITH THE SOLILOQUY OF ONE ADVANCED IN
AGE.

TO MADAME BRILLIANT.

YOU may remember, my dear friend, that when we lately spent that happy day in the delightful garden and sweet society of the *Moulin Joly*, I stopped a little in one of our walks, and staid some time behind the company. We had been shown numberless skeletons of a kind of little fly called an Ephemera, whose successive generations, we were told, were bred and

and expired within the day. I happened to see a living company of them on a leaf, who appeared to be engaged in conversation. You know I understand all the inferior animal tongues; my too great application to the study of them is the best excuse I can give for the little progress I have made in your charming language. I listened through curiosity to the discourse of these little creatures; but as they, in their national vivacity, spoke three or four together, I could make but little of their conversation. I found, however, by some broken expressions that I heard now and then, they were disputing warmly on the merit of two foreign musicians, one a *cousin*, the other a *muschetto*; in which dispute they spent their time, seemingly as regardless of the shortness of life as if they had been sure of living a month. Happy people! thought I, you live certainly under a wise, just, and mild government,

since you have no public grievances to complain of, nor any subject of contention, but the perfections or imperfections of foreign music. I turned my head from them to an old grey-headed one, who was single on another leaf, and talking to himself. Being amused with his soliloquy, I put it down in writing, in hopes it will likewise amuse her to whom I am so much indebted for the most pleasing of all amusements, her delicious company, and heavenly harmony.

“It was,” says he, “the opinion of
“learned philosophers of our race, who
“lived and flourished long before my
“time, that this vast world, the *Moulin*
“*Joly*, could not itself subsist more than
“eighteen hours: and I think there
“was some foundation for that opinion;
“since, by the apparent motion of the
“great luminary that gives life to all
“nature, and which in my time has evi-
“dently

“dently declined considerably towards the
“ocean at the end of our earth, it must
“then finish its course, be extinguished
“in the waters that surround us, and
“leave the world in cold and darkness,
“necessarily producing universal death
“and destruction. I have lived seven
“of those hours; a great age, being no-
“less than 420 minutes of time. How
“very few of us continue so long! I
“have seen generations born, flourish,
“and expire. My present friends are
“the children and grand-children of the
“friends of my youth, who are now,
“alas, no more! And I must soon
“follow them; for, by the course of na-
“ture, though still in health, I cannot
“expect to live above seven or eight
“minutes longer. What now avails all
“my toil and labour, in amassing honey-
“dew on this leaf, which I cannot live
“to enjoy? What the political struggles
“I have been engaged in, for the good
“of

“ of my compatriot inhabitants of this
“ bush, or my philosophical studies, for the
“ benefit of our race in general? for in
“ politics (what can laws do without mo-
“ rals?) our present race of ephemeræ will
“ in a course of minutes become corrupt,
“ like those of other and older bushes,
“ and consequently as wretched. And
“ in philosophy how small our progress!
“ Alas! art is long, and life is short!
“ My friends would comfort me with
“ the idea of a name, they say, I shall
“ leave behind me; and they tell me I
“ have lived long enough to nature and
“ to glory. But what will fame be to
“ an ephemera who no longer exists?
“ and what will become of all history in
“ the eighteenth hour, when the world
“ itself, even the whole *Moulin Joly*,
“ shall come to its end, and be buried in
“ universal ruin?”——

To me, after all my eager pursuits, no
solid pleasures now remain, but the re-
flection .

reflection of a long life spent in meaning well, the sensible conversation of a few good lady ephemeræ, and now and then a kind smile and a tune from the ever amiable Brilliant.

B. FRANKLIN.

ON

MORALS OF CHESS.

PLAYING at chess is the most ancient and most universal game known among men; for its original is beyond the memory of history, and it has, for numberless ages, been the amusement of all the civilized nations of Asia, the Persians, the Indians, and the Chinese. Europe has had it above a thousand years; the Spaniards have spread it over their part of America, and it begins lately to make its appearance in these states. It is so interesting in itself, as not to need the view of gain to induce engaging in it; and thence it is never played for money. Those, therefore, who have leisure for such diversions, cannot find one that is more innocent; and the following piece, written with a view to cor-

rect (among a few young friends) some little improprieties in the practice of it, shews at the same time that it may, in its effects on the mind, be not merely innocent, but advantageous, to the vanquished as well as the victor.

THE game of chess is not merely an idle amusement. Several very valuable qualities of the mind, useful in the course of human life, are to be acquired or strengthened by it, so as to become habits, ready on all occasions. For life is a kind of chess, in which we have often points to gain, and competitors or adversaries to contend with, and in which there is a vast variety of good and ill events, that are, in some degree, the effects of prudence or the want of it. By playing at chess, then, we may learn,

I. *Forefight*, which looks a little into futurity, and considers the consequences that may attend an action: for it is continually

continually occurring to the player, “If
“I move this piece, what will be the
“advantage of my new situation? What
“use can my adversary make of it to
“annoy me? What other moves can I
“make to support it, and to defend my-
“self from his attacks?”

II. *Circumspection*, which surveys the whole chess-board, or scene of action, the relations of the several pieces and situations, the dangers they are respectively exposed to, the several possibilities of their aiding each other, the probabilities that the adversary may make this or that move, and attack this or the other piece, and what different means can be used to avoid his stroke, or turn its consequences against him.

III. *Caution*, not to make our moves too hastily. This habit is best acquired by observing strictly the laws of the game, such as, “If you touch a piece,
“you must move it somewhere; if you

“set it down, you must let it stand:” and it is therefore best that these rules should be observed, as the game thereby becomes more the image of human life, and particularly of war; in which, if you have incautiously put yourself into a bad and dangerous position, you cannot obtain your enemy’s leave to withdraw your troops, and place them more securely, but you must abide all the consequences of your rashness.

And lastly, we learn by chess the habit of *not being discouraged by present bad appearances in the state of our affairs*, the habit of *hoping for a favourable change*, and that of *persevering in the search of resources*. The game is so full of events, there is such a variety of turns in it, the fortune of it is so subject to sudden vicissitudes, and one so frequently, after long contemplation, discovers the means of extricating oneself from a supposed insurmountable difficulty, that one is encouraged to con-

tinue the contest to the last, in hopes of victory by our own skill, or at least of giving a stale mate by the negligence of our adversary. And whoever considers, what in chess he often sees instances of, that particular pieces of success are apt to produce presumption, and its consequent inattention, by which the loss may be recovered, will learn not to be too much discouraged by the present success of his adversary, nor to despair of final good fortune, upon every little check he receives in the pursuit of it.

That we may, therefore, be induced more frequently to choose this beneficial amusement, in preference to others which are not attended with the same advantages, every circumstance which may increase the pleasures of it should be regarded; and every action or word that is unfair, disrespectful, or that in any way may give uneasiness, should be avoided, as contrary to the immediate

intention of both the players, which is, to pass the time agreeably.

Therefore, first, If it is agreed to play according to the strict rules; then those rules are to be exactly observed by both parties, and should not be insisted on for one side, while deviated from by the other—for this is not equitable.

Secondly, If it is agreed not to observe the rules exactly, but one party demands indulgencies, he should then be as willing to allow them to the other.

Thirdly, No false move should ever be made to extricate yourself out of a difficulty, or to gain an advantage. There can be no pleasure in playing with a person once detected in such unfair practices.

Fourthly, If your adversary is long in playing, you ought not to hurry him, or express any uneasiness at his delay. You should not sing, nor whistle, nor look at your watch, nor take up a book

to

to read, nor make a tapping with your feet on the floor, or with your fingers on the table, nor do any thing that may disturb his attention. For all these things displease; and they do not shew your skill in playing, but your craftiness or your rudeness.

Fifthly, You ought not to endeavour to amuse and deceive your adversary, by pretending to have made bad moves, and saying that you have now lost the game, in order to make him secure and careless, and inattentive to your schemes: for this is fraud and deceit, not skill in the game. *

Sixthly, You must not, when you have gained a victory, use any triumphing or insulting expression, nor show too much pleasure; but endeavour to console your adversary, and make himself dissatisfied with himself, by every kind of civil expression that may be used with truth, such as, “ You under-

“ stand the game better than I, but you
“ are a little inattentive ;” or, “ You
“ play too fast ;” or, “ You had the best
“ of the game, but something happened
“ to divert your thoughts, and that turned
“ it in my favour.”

Seventhly, If you are a spectator while others play, observe the most perfect silence. For if you give advice you offend both parties ; him against whom you give it, because it may cause the loss of his game ; him in whose favour you give it, because, though it be good, and he follows it, he loses the pleasure he might have had, if you had permitted him to think until it had occurred to himself. Even after a move, or moves, you must not, by replacing the pieces, shew how it might have been placed better : for that displeases, and may occasion disputes and doubts about their true situation. All talking to the players lessens or diverts their attention, and
is

is therefore unpleasing. Nor should you give the least hint to either party, by any kind of noise or motion. If you do, you are unworthy to be a spectator. If you have a mind to exercise or show your judgment, do it in playing your own game, when you have an opportunity, not in criticising, or meddling with, or counselling the play of others.

Lastly, If the game is not to be played rigorously, according to the rules above mentioned, then moderate your desire of victory over your adversary, and be pleased with one over yourself. Snatch not eagerly at every advantage offered by his unskilfulness or inattention; but point out to him kindly, that by such a move he places or leaves a piece in danger and unsupported; that by another he will put his king in a perilous situation, &c. By this generous civility (so opposite to the unfairness above forbidden) you may, indeed, happen

pen to lose the game to your opponent, but you will win what is better, his esteem, his respect, and his affection; together with the silent approbation and good-will of impartial spectators.

THE
ART OF PROCURING PLEASANT
DREAMS.

INSCRIBED TO MISS ***.

Being written at her request.

AS a great part of our life is spent in sleep, during which we have sometimes pleasing, and sometimes painful dreams, it becomes of some consequence to obtain the one kind, and avoid the other; for, whether real or imaginary, pain is pain, and pleasure is pleasure. If we can sleep without dreaming, it is well that painful dreams are avoided. If, while we sleep, we can have any pleasing dreams, it is, as the French say, *tant gagné*,

gagné, so much added to the pleasure of life.

To this end it is, in the first place, necessary to be careful in preserving health, by due exercise, and great temperance; for, in sickness, the imagination is disturbed; and disagreeable, sometimes terrible, ideas are apt to present themselves. Exercise should precede meals, not immediately follow them: the first promotes, the latter, unless moderate, obstructs digestion. If, after exercise, we feed sparingly, the digestion will be easy and good, the body lightsome, the temper cheerful, and all the animal functions performed agreeably. Sleep, when it follows, will be natural and undisturbed. While indolence, with full feeding, occasions nightmares and horrors inexpressible. we fall from precipices, are assaulted by wild beasts, murderers, and demons, and experience

perience every variety of distress. Observe, however, that the quantities of food and exercise are relative things : those who move much may, and indeed ought to eat more ; those who use little exercise, should eat little. In general, mankind, since the improvement of cookery, eat about twice as much as nature requires. Suppers are not bad, if we have not dined ; but restless nights naturally follow hearty suppers after full dinners. Indeed, as there is a difference in constitutions, some rest well after these meals ; it costs them only a frightful dream, and an apoplexy, after which they sleep till doomsday. Nothing is more common in the newspapers, than instances of people, who, after eating a hearty supper, are found dead a-bed in the morning.

Another means of preserving health, to be attended to, is the having a constant supply of fresh air in your bed-chamber.

chamber. It has been a great mistake, the sleeping in rooms exactly closed, and in beds surrounded by curtains. No outward air, that may come in to you, is so unwholesome as the unchanged air, often breathed, of a close chamber. As boiling water does not grow hotter by longer boiling, if the particles that receive greater heat can escape; so living bodies do not putrefy, if the particles, as fast as they become putrid, can be thrown off. Nature expels them by the pores of the skin and lungs, and in a free open air they are carried off; but, in a close room, we receive them again and again, though they become more and more corrupt. A number of persons crowded into a small room, thus spoil the air in a few minutes, and even render it mortal, as in the Black Hole at Calcutta. A single person is said to spoil only a gallon of air per minute, and therefore requires a longer time to spoil a chamber-full;

full; but it is done, however, in proportion, and many putrid disorders hence have their origin. It is recorded of Methusalem, who, being the longest liver, may be supposed to have best preserved his health, that he slept always in the open air; for, when he had lived five hundred years, an angel said to him: "Arise, Methusalem, and build thee an house; for thou shalt live yet five hundred years longer." But Methusalem answered and said: "If I am to live but five hundred years longer, it is not worth while to build me an house—I will sleep in the air as I have been used to do." Physicians, after having for ages contended that the sick should not be indulged with fresh air, have at length discovered that it may do them good. It is therefore to be hoped that they may in time discover likewise, that it is not hurtful to those who are in health; and that we may be then cured of the *aërophobia*

aërophobia that at present distresses weak minds, and makes them choose to be stifled and poisoned, rather than leave open the window of a bed-chamber, or put down the glass of a coach.

Confined air, when saturated with perspirable matter *, will not receive more : and that matter must remain in our bodies, and occasion diseases : but it gives some previous notice of its being about to be hurtful, by producing certain uneasinesses, slight indeed at first, such as, with regard to the lungs, is a tickling sensation, and to the pores of the skin a kind of restlessness which is difficult to describe, and few that feel it know the cause of it. But we may recollect, that sometimes, on waking in the night, we have, if warmly covered, found it

* What physicians call the perspirable matter, is the vapour which passes off from our bodies, from the lungs, and through the pores of the skin. The quantity of this is said to be five-eighths of what we eat.

difficult

difficult to get asleep again. We turn often without finding repose in any position. This fidgettiness, to use a vulgar expression for want of a better, is occasioned wholly by an uneasiness in the skin, owing to the retention of the perspirable matter—the bed-clothes having received their quantity, and, being saturated, refusing to take any more. To become sensible of this by an experiment, let a person keep his position in the bed, but throw off the bed-clothes, and suffer fresh air to approach the part uncovered of his body; he will then feel that part suddenly refreshed; for the air will immediately relieve the skin, by receiving, licking up, and carrying off, the load of perspirable matter that incommoded it. For every portion of cool air that approaches the warm skin, in receiving its part of that vapour, receives therewith a degree of

heat that rarefies and renders it lighter, when it will be pushed away, with its burthen, by cooler, and therefore heavier fresh air ; which, for a moment, supplies its place, and then, being likewise changed, and warmed, gives way to a succeeding quantity. This is the order of nature, to prevent animals being infected by their own perspiration. He will now be sensible of the difference between the part exposed to the air, and that which, remaining sunk in the bed, denies the air access : for this part now manifests its uneasiness more distinctly by the comparison, and the seat of the uneasiness is more plainly perceived, than when the whole surface of the body was affected by it.

Here, then, is one great and general cause of unpleasing dreams. For when the body is uneasy, the mind will be disturbed by it, and disagreeable ideas
of

of various kinds will, in sleep, be the natural consequences. The remedies, preventative, and curative, follow :

1. By eating moderately (as before advised for health's sake) less perspirable matter is produced in a given time; hence the bed-clothes receive it longer before they are saturated; and we may, therefore, sleep longer, before we are made uneasy by their refusing to receive any more.

2. By using thinner and more porous bed-clothes, which will suffer the perspirable matter more easily to pass through them, we are less incommoded, such being longer tolerable.

3. When you are awakened by this uneasiness, and find you cannot easily sleep again, get out of bed, beat up and turn your pillow, shake the bed-clothes well, with at least twenty shakes, then throw the bed open, and leave it to cool; in the meanwhile, continuing undrest,

walk about your chamber, till your skin has had time to discharge its load, which it will do sooner as the air may be drier and colder. When you begin to feel the cold air unpleasant, then return to your bed; and you will soon fall asleep, and your sleep will be sweet and pleasant. All the scenes presented to your fancy will be of the pleasing kind. I am often as agreeably entertained with them, as by the scenery of an opera. If you happen to be too indolent to get out of bed, you may, instead of it, lift up your bed-clothes with one arm and leg, so as to draw in a good deal of fresh air, and, by letting them fall, force it out again. This repeated twenty times will so clear them of the perspirable matter they have imbibed, as to permit your sleeping well for some time afterwards. But this latter method is not equal to the former.

•

Those

Those who do not love trouble, and can afford to have two beds, will find great luxury in rising, when they awake in a hot bed, and going into the cool one. Such shifting of beds would also be of great service to persons ill of a fever, as it refreshes, and frequently procures sleep. A very large bed, that will admit a removal so distant from the first situation as to be cool and sweet, may in a degree answer the same end.

One or two observations more will conclude this little piece. Care must be taken, when you lie down, to dispose your pillow so as to suit your manner of placing your head, and to be perfectly easy; then place your limbs so as not to bear inconveniently hard upon one another, as, for instance, the joints of your ancles: for though a bad position may at first give but little pain, and be hardly noticed, yet a continuance

will render it less tolerable, and the uneasiness may come on while you are asleep, and disturb your imagination.

These are the rules of the art. But though they will generally prove effectual in producing the end intended, there is a case in which the most punctual observance of them will be totally fruitless. I need not mention the case to you, my dear friend: but my account of the art would be imperfect without it. The case is, when the person who desires to have pleasant dreams has not taken care to preserve, what is necessary above all things,

A GOOD CONSCIENCE.

ADVICE.

ADVICE TO A YOUNG TRADESMAN.

WRITTEN ANNO 1748.

To my Friend A. B.

As you have desired it of me, I write the following Hints, which have been of service to me, and may, if observed, be so to you.

REMEMBER that *time* is money. He that can earn ten shillings a day, by his labour, and goes abroad, or sits idle one half of that day, though he spends but sixpence during his diversion or idleness, ought not to reckon *that* the only expence; he has really spent, or rather thrown away, five shillings besides.

Remember that *credit* is money. If a man lets his money lie in my hands

E 4

after

after it is due, he gives me the interest, or so much as I can make of it during that time. This amounts to a considerable sum where a man has good and large credit, and makes good use of it.

Remember that money is of a prolific generating nature. Money can beget money, and its offspring can beget more, and so on. Five shillings turned is six; turned again, it is seven and three-pence; and so on till it becomes an hundred pounds. The more there is of it, the more it produces every turning, so that the profits rise quicker and quicker. He that kills a breeding sow, destroys all her offspring to the thousandth generation. He that murders a crown, destroys all that it might have produced, even scores of pounds.

Remember that six pounds a year is but a groat a day. For this little sum (which may be daily wasted either in time or expence unperceived), a man
of

of credit may, on his own security, have the constant possession and use of an hundred pounds. So much in stock, briskly turned by an industrious man, produces great advantage.

Remember this saying, "The good paymaster is lord of another man's purse." He that is known to pay punctually and exactly to the time he promises, may at any time, and on any occasion, raise all the money his friends can spare. This is sometimes of great use. After industry and frugality, nothing contributes more to the raising of a young man in the world, than punctuality and justice in all his dealings: therefore never keep borrowed money an hour beyond the time you promised, lest a disappointment shut up your friend's purse for ever.

The most trifling actions that affect a man's credit are to be regarded. The sound of your hammer at five in the morning,

morning, or nine at night, heard by a creditor, makes him easy six months longer: but if he sees you at a billiard table, or hears your voice at a tavern, when you should be at work, he sends for his money the next day; demands it, before he can receive it, in a lump.

It shews, besides, that you are mindful of what you owe; it makes you appear a careful, as well as an honest man, and that still increases your credit.

Beware of thinking all your own that you possess, and of living accordingly. It is a mistake that many people who have credit fall into. To prevent this, keep an exact account, for some time, both of your expences and your income. If you take the pains at first to mention particulars, it will have this good effect; you will discover how wonderfully small trifling expences mount up to large sums, and will discern what might have been, and may for the future

be saved, without occasioning any great inconvenience.

In short, the way to wealth, if you desire it, is as plain as the way to market. It depends chiefly on two words, *industry* and *frugality*; that is, waste neither *time* nor *money*, but make the best use of both. Without industry and frugality nothing will do, and with them every thing. He that gets all he can honestly, and saves all he gets (necessary expences excepted), will certainly become *rich*—if that Being who governs the world, to whom all should look for a blessing on their honest endeavours, doth not, in his wise providence, otherwise determine.

AN OLD TRADESMAN.

NECES-

NECESSARY HINTS TO THOSE THAT
WOULD BE RICH.

WRITTEN ANNO 1736.

THE use of money is all the advantage there is in having money.

For six pounds a year you may have the use of one hundred pounds, provided you are a man of known prudence and honesty.

He that spends a groat a day idly, spends idly above six pounds a year, which is the price for the use of one hundred pounds.

He that wastes idly a groat's worth of his time per day, one day with another, wastes the privilege of using one hundred pounds each day.

He that idly loses five shillings worth
of

of time, loses five shillings, and might as prudently throw five shillings into the sea.

He that loses five shillings, not only loses that sum, but all the advantage that might be made by turning it in dealing, which, by the time that a young man becomes old, will amount to a considerable sum of money.

Again: he that sells upon credit, asks a price for what he sells equivalent to the principal and interest of his money for the time he is to be kept out of it; therefore, he that buys upon credit, pays interest for what he buys; and he that pays ready money, might let that money out to use: so that he that possesses any thing he has bought, pays interest for the use of it.

Yet, in buying goods, it is best to pay ready money, because he that sells upon credit expects to lose five per cent. by bad debts; therefore he charges, on
all

all he sells upon credit, an advance that shall make up that deficiency.

Those who pay for what they buy upon credit, pay their share of this advance.

He that pays ready money, escapes, or may escape, that charge.

A penny sav'd is two-pence clear ;

A pin a day's a groat a year.

THE WAY TO MAKE MONEY PLENTY
IN EVERY MAN'S POCKET.

AT this time, when the general complaint is that—"money is scarce," it will be an act of kindness to inform the moneyless how they may reinforce their pockets. I will acquaint them with the true secret of money-catching—the certain way to fill empty purses—and how to keep them always full. Two simple rules, well observed, will do the business.

First, let honesty and industry be thy constant companions ; and,

Secondly, spend one penny less than thy clear gains.

Then shall thy hide-bound pocket soon begin to thrive, and will never again

again cry with the empty belly-ach: neither will creditors insult thee, nor want oppress, nor hunger bite, nor nakedness freeze thee. The whole hemisphere will shine brighter, and pleasure spring up in every corner of thy heart. Now, therefore, embrace these rules and be happy. Banish the bleak winds of sorrow from thy mind, and live independent. Then shalt thou be a man, and not hide thy face at the approach of the rich, nor suffer the pain of feeling little when the sons of fortune walk at thy right hand: for independency, whether with little or much, is good-fortune, and placeth thee on even ground with the proudest of the golden fleece. Oh, then, be wise, and let industry walk with thee in the morning, and attend thee until thou reachest the evening hour for rest. Let honesty be as the breath of thy soul, and never forget to have a penny, when all thy expences

expences are enumerated and paid : then shalt thou reach the point of happiness, and independence shall be thy shield and buckler, thy helmet and crown ; then shall thy soul walk upright, nor stoop to the filken wretch because he hath riches, nor pocket an abuse because the hand which offers it wears a ring set with diamonds.

AN ŒCONOMICAL PROJECT.

[*A Translation of this Letter appeared in one of the Daily Papers of Paris, about the Year 1784. The following is the Original Piece, with some Additions and Corrections made in it by the Author.*]

To the AUTHOR of the JOURNAL.

MESSIEURS,

YOU often entertain us with accounts of new discoveries. Permit me to communicate to the public, through your paper, one that has lately been made by myself, and which I conceive may be of great utility.

I was the other evening in a grand company, where the new lamp of Messrs. Quinquet

Quinquet and Lange was introduced, and much admired for its splendour; but a general enquiry was made, whether the oil it consumed was not in proportion to the light it afforded, in which case there would be no saving in the use of it. No one present could satisfy us in that point, which all agreed ought to be known; it being a very desirable thing to lessen, if possible, the expence of lighting our apartments, when every other article of family expence was so much augmented.

I was pleased to see this general concern for œconomy; for I love œconomy exceedingly.

I went home, and to bed, three or four hours after midnight, with my head full of the subject. An accidental sudden noise waked me about six in the morning, when I was surpris'd to find my room filled with light; and I imagined at first, that a number of those

lamps had been brought into it: but, rubbing my eyes, I perceived the light came in at the windows. I got up, and looked out to see what might be the occasion of it, when I saw the sun just rising above the horizon, from whence he poured his rays plentifully into my chamber, my domestic having negligently omitted the preceding evening to close the shutters.

I looked at my watch, which goes very well, and found that it was but six o'clock; and still thinking it something extraordinary that the sun should rise so early, I looked into the almanack, where I found it to be the hour given for his rising on that day. I looked forward too, and found he was to rise still earlier every day till towards the end of June; and that at no time in the year he retarded his rising so long as till eight o'clock. Your readers who with me have never seen any signs of sunshine
before

before noon, and seldom regard the astronomical part of the almanack, will be as much astonished as I was, when they hear of his rising so early; and especially when I assure them, *that he gives light as soon as he rises*. I am convinced of this. I am certain of my fact. One cannot be more certain of any fact. I saw it with my own eyes. And having repeated this observation the three following mornings, I found always precisely the same result.

Yet so it happens, that when I speak of this discovery to others, I can easily perceive by their countenances, though they forbear expressing it in words, that they do not quite believe me. One indeed, who is a learned natural philosopher, has assured me, that I must certainly be mistaken as to the circumstance of the light coming into my room; for it being well known, as he says, that there could be no light abroad at that hour,

it follows that none could enter from without; and that of consequence, my windows being accidentally left open, instead of letting in the light, had only served to let out the darkness: and he used many ingenious arguments to show me how I might, by that means, have been deceived. I own that he puzzled me a little, but he did not satisfy me; and the subsequent observations I made, as above mentioned, confirmed me in my first opinion.

This event has given rise, in my mind, to several serious and important reflections. I considered that, if I had not been awakened so early in the morning, I should have slept six hours longer by the light of the sun, and in exchange have lived six hours the following night by candle-light; and the latter being a much more expensive light than the former, my love of œconomy induced me to muster up what little arithmetic

I was

I was master of, and to make some calculations, which I shall give you, after observing that utility is, in my opinion, the test of value in matters of invention, and that a discovery which can be applied to no use, or is not good for something, is good for nothing.

I took for the basis of my calculation the supposition that there are 100,000 families in Paris, and that these families consume in the night half a pound of bougies, or candles, per hour. I think this is a moderate allowance, taking one family with another; for though I believe some consume less, I know that many consume a great deal more. Then estimating seven hours per day, as the medium quantity between the time of the sun's rising and ours, he rising during the six following months from six to eight hours before noon, and there being seven hours of course per night in which we

burn candles, the account will stand thus—

In the six months between the twentieth of March and the twentieth of September, there are

Nights - - - - - 183

Hours of each night in
which we burn candles 7

Multiplication gives for
the total number of
hours - - - - - 1,281

These 1,281 hours multiplied by 100,000, the
number of families,
give - - - - - 128,100,000

One hundred twenty-eight
millions and one hundred
thousand hours,
spent at Paris by candle-light, which, at half
a pound of wax and

tallow

tallow per hour, gives
 the weight of - - - 64,050,000
 Sixty-four millions and
 fifty thousand of pounds,
 which, estimating the
 whole at the medium
 price of thirty sols the
 pound, makes the sum
 of ninety-six millions
 and seventy-five thou-
 sand livres tournois - 96,075,000

An immense sum! that the city of
 Paris might save every year, by the œco-
 nomy of using sunshine instead of can-
 dles.

If it should be said, that people are
 apt to be obstinately attached to old
 customs, and that it will be difficult to
 induce them to rise before noon, con-
 sequently my discovery can be of little
 use; I answer, *Nil desperandum*. I be-
 lieve all who have common sense, as
 soon as they have learnt from this paper
 that

that it is day-light when the sun rises, will contrive to rise with him; and, to compel the rest, I would propose the following regulations:

First. Let a tax be laid of a louis per window, on every window that is provided with shutters to keep out the light of the sun.

Second. Let the same salutary operation of police be made use of to prevent our burning candles, that inclined us last winter to be more œconomical in burning wood; that is, let guards be placed in the shops of the wax and tallow chandlers, and no family be permitted to be supplied with more than one pound of candles per week.

Third. Let guards also be posted to stop all the coaches, &c. that would pass the streets after sun-set, except those of physicians, surgeons, and midwives.

Fourth. Every morning, as soon as the sun rises, let all the bells in every church

church be set ringing; and if that is not sufficient, let cannon be fired in every street, to wake the sluggards effectually, and make them open their eyes to see their true interest.

All the difficulty will be in the first two or three days; after which the reformation will be as natural and easy as the present irregularity: for *ce n'est que le premier pas qui coûte*. Oblige a man to rise at four in the morning, and it is more than probable he will go willingly to bed at eight in the evening; and, having had eight hours sleep, he will rise more willingly at four the morning following. But this sum of ninety-six millions and seventy-five thousand livres is not the whole of what may be saved by my œconomical project. You may observe, that I have calculated upon only one half of the year, and much may be saved in the other though the days are shorter. Besides, the immense
stock

stock of wax and tallow left unconsumed during the summer, will probably make candles much cheaper for the ensuing winter, and continue cheaper as long as the proposed reformation shall be supported.

For the great benefit of this discovery, thus freely communicated and bestowed by me on the public, I demand neither place, pension, exclusive privilege, nor any other reward whatever. I expect only to have the honour of it. And yet I know there are little envious minds who will, as usual, deny me this, and say that my invention was known to the ancients; and perhaps they may bring passages out of the old books in proof of it. I will not dispute with these people, that the ancients knew not that the sun would rise at certain hours; they possibly had, as we have, almanacks that predicted it: but it does not follow from thence that they knew *he gave light*

as soon as he rose. This is what I claim as my discovery. If the ancients knew it, it must have been long since forgotten, for it certainly was unknown to the moderns, at least to the Parisians; which to prove, I need use but one plain simple argument. They are as well instructed, judicious, and prudent a people as exist any where in the world, all professing, like myself, to be lovers of œconomy; and, from the many heavy taxes required from them by the necessities of the state, have surely reason to be œconomical. I say it is impossible that so sensible a people, under such circumstances, should have lived so long by the smoky, unwholesome, and enormously expensive light of candles, if they had really known that they might have had as much pure light of the sun for nothing. I am, &c.

AN ABONNE.

ON

ON MODERN INNOVATIONS IN THE
ENGLISH LANGUAGE AND IN
PRINTING.

To NOAH WEBSTER, *jun. Esq.* at HARTFORD.

Philadelphia, Dec. 26, 1789.

DEAR SIR,

I RECEIVED, some time since, your *Dissertations on the English Language*. It is an excellent work, and will be greatly useful in turning the thoughts of our countrymen to correct writing. Please to accept my thanks for it, as well as for the great honour you have done me in its dedication. I ought to have made this acknowledgment sooner, but much indisposition prevented me.

I cannot but applaud your zeal for preserving the purity of our language both in its expression and pronunciation,

and in correcting the popular errors several of our states are continually falling into with respect to both. Give me leave to mention some of them, though possibly they may already have occurred to you. I wish, however, that in some future publication of yours you would set a discountenancing mark upon them. The first I remember, is the word *improved*. When I left New England in the year 1723, this word had never been used among us, as far as I know, but in the sense of *ameliorated*, or *made better*, except once in a very old book of Dr. Mather's, entitled *Remarkable Providences*. As that man wrote a very obscure hand, I remember that when I read that word in his book, used instead of the word *employed*, I conjectured that it was an error of the printer, who had mistaken a short *l* in the writing for an *r*, and a *y* with too short a tail for a *v*, whereby *employed* was converted into
improved:

improved: but when I returned to Boston in 1733, I found this change had obtained favour, and was then become common; for I met with it often in perusing the newspapers, where it frequently made an appearance rather ridiculous. Such, for instance, as the advertisement of a country house to be sold, which had been many years *improved* as a tavern; and in a character of a deceased country gentleman, that he had been, for more than thirty years, *improved* as a justice of the peace. This use of the word *improve* is peculiar to New England, and not to be met with among any other speakers of English, either on this or the other side of the water.

During my late absence in France, I find that several other new words have been introduced into our parliamentary language. For example, I find a verb formed from the substantive *notice*. *I should not have noticed this, were it not that*

that the gentleman, &c. Also another, verb, from the substantive *advocate*; *The gentleman who advocates, or who has advocated that motion, &c.* Another from the substantive *progress*, the most awkward and abominable of the three: *The committee having progressed, resolved to adjourn.* The word *opposed*, though not a new word, I find used in a new manner, as, *The gentlemen who are opposed to this measure, to which I have also myself always been opposed.* If you should happen to be of my opinion with respect to these innovations, you will use your authority in reprobating them.

The Latin language, long the vehicle used in distributing knowledge among the different nations of Europe, is daily more and more neglected; and one of the modern tongues, viz. French, seems, in point of universality to have supplied its place. It is spoken in all the courts of Europe; and most of the lite-

rati, those even who do not speak it, have acquired enough knowledge of it to enable them easily to read the books that are written in it. This gives a considerable advantage to that nation. It enables its authors to inculcate and spread through other nations, such sentiments and opinions, on important points, as are most conducive to its interests, or which may contribute to its reputation, by promoting the common interests of mankind. It is, perhaps, owing to its being written in French, that Voltaire's Treatise on Toleration has had so sudden and so great an effect on the bigotry of Europe, as almost entirely to disarm it. The general use of the French language has likewise a very advantageous effect on the profits of the bookselling branch of commerce; it being well known, that the more copies can be sold that are struck off from one composition of types, the profits increase in a much greater proportion

portion than they do in making a greater number of pieces in any other kind of manufacture. And at present there is no capital town in Europe without a French bookseller's shop corresponding with Paris. Our English bids fair to obtain the second place. The great body of excellent printed sermons in our language, and the freedom of our writings on political subjects, have induced a great number of divines of different sects and nations, as well as gentlemen concerned in public affairs, to study it, so far at least as to read it. And if we were to endeavour the facilitating its progress, the study of our tongue might become much more general. Those who have employed some part of their time in learning a new language, must have frequently observed, that while their acquaintance with it was imperfect difficulties, small in themselves, operated as great ones in obstructing their pro-

gress. A book, for example, ill printed, or a pronounciation in speaking not well articulated, would render a sentence unintelligible, which from a clear print, or a distinct speaker, would have been immediately comprehended. If, therefore, we would have the benefit of seeing our language more generally known among mankind, we should endeavour to remove all the difficulties, however small, that discourage the learning of it. But I am sorry to observe that, of late years, those difficulties, instead of being diminished, have been augmented.

In examining the English books that were printed between the restoration and the accession of George the Second, we may observe, that all substantives were begun with a capital, in which we imitated our mother tongue, the German. This was more particularly useful to those who were not well acquainted with the English, there being such a prodigious
4 number

number of our words that are both verbs and substantives, and spelt in the same manner, though often accented differently in pronunciation. This method has, by the fancy of printers, of late years been entirely laid aside; from an idea, that suppressing the capitals shews the character to greater advantage; those letters, prominent above the line, disturbing its even, regular appearance. The effect of this change is so considerable, that a learned man of France, who used to read our books, though not perfectly acquainted with our language, in conversation with me on the subject of our authors, attributed the greater obscurity he found in our modern books, compared with those of the period above mentioned, to a change of style for the worse in our writers; of which mistake I convinced him, by marking for him each substantive with a capital, in a paragraph, which he

then easily understood, though before he could not comprehend it. This shews the inconvenience of that pretended improvement.

From the same fondness for an uniform and even appearance of characters in the line, the printers have of late banished also the *Italic* types, in which words of importance to be attended to in the sense of the sentence, and words on which an emphasis should be put in reading, used to be printed. And lately another fancy has induced other printers to use the round *s* instead of the long one, which formerly served well to distinguish a word readily by its varied appearance. Certainly the omitting this prominent letter makes a line appear more even, but renders it less immediately legible; as the paring of all men's noses might smooth and level their faces, but would render their physiognomies less distinguishable. Add to all these improvements backwards,
another

another modern fancy, that *grey* printing is more beautiful than black. Hence the English new books are printed in so dim a character as to be read with difficulty by old eyes, unless in a very strong light, and with good glasses. Whoever compares a volume of the Gentleman's Magazine, printed between the years 1731 and 1740, with one of those printed in the last ten years, will be convinced of the much greater degree of perspicuity given by black than by the grey. Lord Chesterfield pleasantly remarked this difference to Faulkener, the Printer of the Dublin Journal, who was vainly making encomiums on his own paper, as the most complete of any in the world. "But, Mr. Faulkener," says my lord, "don't you think it might be still farther improved, by using paper and ink not quite so near of a colour?"—For all these reasons I cannot but wish that our American

printers would, in their editions, avoid these fancied improvements, and thereby render their works more agreeable to foreigners in Europe, to the great advantage of our bookfelling commerce.

Farther, to be more sensible of the advantage of clear and distinct printing, let us consider the assistance it affords in reading well aloud to an auditory. In so doing the eye generally slides forward three or four words before the voice. If the sight clearly distinguishes what the coming words are, it gives time to order the modulation of the voice to express them properly. But if they are obscurely printed, or disguised by omitting the capitals and long *s*'s, or otherwise, the reader is apt to modulate wrong; and, finding he has done so, he is obliged to go back and begin the sentence again; which lessens the pleasure of the hearers. This leads me to mention an old error in our mode of printing. We are sensible
that

that when a question is met with in the reading, there is a proper variation to be used in the management of the voice. We have, therefore, a point, called an interrogation, affixed to the question, in order to distinguish it. But this is absurdly placed at its end, so that the reader does not discover it till he finds that he has wrongly modulated his voice, and is therefore obliged to begin again the sentence. To prevent this, the Spanish Printers, more sensibly, place an interrogation at the beginning as well as at the end of the question. We have another error of the same kind in printing plays, where something often occurs that is marked as spoken *aside*. But the word *aside* is placed at the end of the speech, when it ought to precede it, as a direction to the reader, that he may govern his voice accordingly. The practice of our ladies in meeting five or six together, to form little busy parties, where

where each is employed in some useful work, while one reads to them, is so commendable in itself, that it deserves the attention of authors and printers to make it as pleasing as possible, both to the reader and hearers.

My best wishes attend you, being, with sincere esteem,

Sir,

Your most obedient and
very humble servant,

B. FRANKLIN.

AN ACCOUNT OF THE HIGHEST COURT
OF JUDICATURE IN PENNSYLVANIA,
VIZ.

THE COURT OF THE PRESS.

Power of this court.

IT may receive and promulgate accusations of all kinds, against all persons and characters among the citizens of the state, and even against all inferior courts; and may judge, sentence, and condemn to infamy, not only private individuals, but public bodies, &c. with or without enquiry or hearing, at the court's discretion.

*In whose favour, or for whose emolument,
this court is established.*

In favour of about one citizen in five hundred, who, by education, or practice
in

in scribbling, has acquired a tolerable style as to grammar and construction, so as to bear printing: or who is possessed of a press and a few types. This five hundredth part of the citizens have the privilege of accusing and abusing the other four hundred and ninety-nine parts at their pleasure; or they may hire out their pens and presses to others, for that purpose.

Practice of this court.

It is not governed by any of the rules of the common courts of law. The accused is allowed no grand jury to judge of the truth of the accusation before it is publicly made; nor is the name of the accuser made known to him; nor has he an opportunity of confronting the witnesses against him, for they are kept in the dark, as in the Spanish court of inquisition. Nor is there any petty jury of his peers sworn
to

to try the truth of the charges. The proceedings are also sometimes so rapid, that an honest good citizen may find himself suddenly and unexpectedly accused, and in the same morning judged and condemned, and sentence pronounced against him that he is a rogue and a villain. Yet if an officer of this court receives the slightest check for misconduct in this his office, he claims immediately the rights of a free citizen by the constitution, and demands to know his accuser, to confront the witnesses, and to have a fair trial by a jury of his peers.

The foundation of its authority.

It is said to be founded on an article in the state constitution, which establishes the liberty of the press—a liberty which every Pennsylvanian would fight and die for, though few of us, I believe, have distinct ideas of its nature and extent.

extent. It seems, indeed, somewhat like the liberty of the press, that felons have by the common law of England before conviction; that is to be either pressed to death or hanged. If, by the liberty of the press, were understood merely the liberty of discussing the propriety of public measures and political opinions, let us have as much of it as you please; but if it means the liberty of affronting, calumniating, and defaming one another, I, for my part, own myself willing to part with my share of it, whenever our legislators shall please so to alter the law; and shall cheerfully consent to exchange my liberty of abusing others, for the privilege of not being abused myself.

By whom this court is commissioned or constituted.

It is not by any commission from the supreme executive council, who might previously

previously judge of the abilities, integrity, knowledge, &c. of the persons to be appointed to this great trust, of deciding upon the characters and good fame of the citizens; for this court is above that council, and may accuse, judge, and condemn it at pleasure. Nor is it hereditary, as is the court of dernier ressort in the peerage of England. But any man who can procure pen, ink, and paper, with a press, a few types, and a huge pair of blacking balls, may commissionate himself, and his court is immediately established in the plenary possession and exercise of its rights. For if you make the least complaint of the judge's conduct, he dabs his blacking-balls in your face wherever he meets you; and, besides tearing your private character to splinters, marks you out for the odium of the public, as an enemy to the liberty of the press.

Of

Of the natural support of this court.

Its support is founded in the depravity of such minds as have not been mended by religion, nor improved by good education.

There is a lust in man no charm can tame,
Of loudly publishing his neighbour's shame.

Hence,

On eagle's wings, immortal, scandals fly,
While virtuous actions are but born and die.

DRYDEN.

Whoever feels pain in hearing a good character of his neighbour, will feel a pleasure in the reverse. And of those who, despairing to rise to distinction by their virtues, are happy if others can be depressed to a level with themselves, there are a number sufficient in every great town to maintain one of these courts by their subscription. A shrewd observer once said, that in walking the streets
of

of a slippery morning, one might see where the good-natured people lived, by the ashes thrown on the ice before the doors: probably he would have formed a different conjecture of the temper of those whom he might find engaged in such subscriptions.

Of the checks proper to be established against the abuses of power in those courts.

Hitherto there are none. But since so much has been written and published on the federal constitution; and the necessity of checks, in all other parts of good government, has been so clearly and learnedly explained, I find myself so far enlightened as to suspect some check may be proper in this part also: but I have been at a loss to imagine any that may not be construed an infringement of the sacred liberty of the press. At length, however, I think I

have found one, that, instead of diminishing general liberty, shall augment it; which is, by restoring to the people a species of liberty of which they have been deprived by our laws, I mean the liberty of the cudgel! In the rude state of society, prior to the existence of laws, if one man gave another ill-language, the affronted person might return it by a box on the ear; and if repeated, by a good drubbing; and this without offending against any law: but now the right of making such returns is denied, and they are punished as breaches of the peace, while the right of abusing seems to remain in full force; the laws made against it being rendered ineffectual by the liberty of the press.

My proposal then is, to leave the liberty of the press untouched, to be exercised in its full extent, force, and vigour, but to permit the liberty of the cudgel to go with it *pari passu*. Thus,
my

my fellow citizens, if an impudent writer attacks your reputation—dearer perhaps to you than your life—and puts his name to the charge, you may go to him as openly, and break his head. If he conceals himself behind the printer, and you can nevertheless discover who he is, you may in like manner way-lay him in the night, attack him behind, and give him a good drubbing. If your adversary hires better writers than himself, to abuse you more effectually, you may hire brawny porters, stronger than yourself, to assist you in giving him a more effectual drubbing. Thus far goes my project, as to *private* resentment and retribution. But if the public should ever happen to be affronted, as it ought to be, with the conduct of such writers, I would not advise proceeding immediately to these extremities, but that we should in moderation content ourselves

with tarring and feathering, and tossing them in a blanket.

If, however, it should be thought that this proposal of mine may disturb the public peace, I would then humbly recommend to our legislators to take up the consideration of both liberties, that of the press, and that of the cudgel; and by an explicit law mark their extent and limits: and at the same time that they secure the person of a citizen from assaults, they will likewise provide for the security of his reputation.

PAPER:

PAPER: A POEM.

SOME wit of old—such wits of old there
were—

Whose hints shew'd meaning, whose allusions
care,

By one brave stroke to mark all human kind,
Call'd clear blank paper ev'ry infant mind;
When still, as opening sense her dictates wrote,
Fair virtue put a seal, or vice a blot.

The thought was happy, pertinent, and true;
Methinks a genius might the plan pursue.

I (can you pardon my presumption?) I—

No wit, no genius, yet for once will try.

Various the papers various wants produce,
The wants of fashion, elegance, and use.
Men are as various; and, if right I scan,
Each sort of *paper* represents some *man*.

Pray note the fop—half powder and half
lace—

Nice, as a bandbox were his dwelling-place :
He's the *gilt-paper*, which apart you store,
And lock from vulgar hands in the 'scritoire.

Mechanics, servants, farmers, and so forth,
Are *copy-paper*, of inferior worth ;
Less priz'd, more useful, for your desk decreed,
Free to all pens, and prompt at every need.

The wretch whom av'rice bids to pinch and
spare,
Starve, cheat, and pilfer, to enrich an heir,
Is coarse *brown-paper* ; such as pedlars choose
To wrap up wares, which better men will use.

Take next the miser's contrast, who destroys
Health, fame, and fortune, in a round of joys.
'Will any paper match him ? Yes, throughout,
He's a true *sinking-paper*, past all doubt.

The retail politician's anxious thought
Deems *this* side always right, and *that* stark
nought ;

He

He foams with censure ; with applause he
raves—

A dupe to rumours, and a tool of knaves ;
He'll want no type his weakness to proclaim,
While such a thing as *fools-cap* has a name.

The hasty gentleman, whose blood runs high,
Who picks a quarrel, if you step awry,
Who can't a jest, a hint, or look endure :
What is he ? What ? *Touch-paper*, to be sure.

What are our poets, take them as they fall,
Good, bad, rich, poor, much read, not read at
all ?

Them and their works in the same class you'll
find ;

They are the mere *waste-paper* of mankind.

Observe the maiden, innocently sweet,
She's fair *white-paper*, an unfulfilled sheet ;
On which the happy man whom fate ordains,
May write his *name*, and take her for his pains.

One instance more, and only one I'll bring ;
'Tis the *great man* who scorns a little thing,

Whose thoughts, whose deeds, whose maxims
are his own,

Form'd on the feelings of his heart alone :

True genuine *royal-paper* is his breast ;

Of all the kinds, most precious, purest, best

ON THE ART OF SWIMMING.

*In answer to some enquiries of M. Dubourg * on
the subject.*

I AM apprehensive that I shall not be able to find leisure for making all the disquisitions and experiments which would be desirable on this subject. I must, therefore, content myself with a few remarks.

The specific gravity of some human bodies, in comparison to that of water, has been examined by Mr. Robinson, in our Philosophical Transactions, volume 50, page 30, for the year 1757. He asserts, that fat persons with small bones float most easily upon water.

* Translator of Dr. Franklin's works into French.

The diving bell is accurately described in our Transactions.

When I was a boy, I made two oval pallets, each about ten inches long, and six broad, with a hole for the thumb, in order to retain it fast in the palm of my hand. They much resemble a painter's pallets. In swimming I pushed the edges of these forward, and I struck the water with their flat surfaces as I drew them back. I remember I swam faster by means of these pallets, but they fatigued my wrists.—I also fitted to the soles of my feet a kind of sandals; but I was not satisfied with them, because I observed that the stroke is partly given by the inside of the feet and the ancles, and not entirely with the soles of the feet.

We have here waistcoats for swimming, which are made of double sail-cloth, with small pieces of cork quilted in between them.

I know

I know nothing of the *scaphandre* of M. de la Chapelle.

I know by experience that it is a great comfort to a swimmer, who has a considerable distance to go, to turn himself sometimes on his back, and to vary in other respects the means of procuring a progressive motion.

When he is seized with the cramp in the leg, the method of driving it away, is to give to the parts affected a sudden, vigorous, and violent shock; which he may do in the air as he swims on his back.

During the great heats of summer there is no danger in bathing, however warm we may be, in rivers which have been thoroughly warmed by the sun. But to throw oneself into cold spring water, when the body has been heated by exercise in the sun, is an imprudence which may prove fatal. I once knew an instance of four young men, who,
having

having worked at harvest in the heat of the day, with a view of refreshing themselves plunged into a spring of cold water: two died upon the spot, a third the next morning, and the fourth recovered with great difficulty. A copious draught of cold water, in similar circumstances, is frequently attended with the same effect in North America.

The exercise of swimming is one of the most healthy and agreeable in the world. After having swam for an hour or two in the evening, one sleeps coolly the whole night, even during the most ardent heat of summer. Perhaps the pores being cleansed, the insensible perspiration increases, and occasions this coolness.—It is certain that much swimming is the means of stopping a diarrhœa, and even of producing a constipation. With respect to those who do not know how to swim, or who are affected with a diarrhœa at a season which does
not

not permit them to use that exercise, a warm bath, by cleansing and purifying the skin, is found very salutary, and often effects a radical cure. I speak from my own experience, frequently repeated, and that of others to whom I have recommended this.

You will not be displeased if I conclude these hasty remarks by informing you, that as the ordinary method of swimming is reduced to the act of rowing with the arms and legs, and is consequently a laborious and fatiguing operation when the space of water to be crossed is considerable; there is a method in which a swimmer may pass to great distances with much facility, by means of a sail. This discovery I fortunately made by accident, and in the following manner.

When I was a boy I amused myself one day with flying a paper kite; and approaching the bank of a pond, which

was near a mile broad, I tied the string to a stake, and the kite ascended to a very considerable height above the pond, while I was swimming. In a little time, being desirous of amusing myself with my kite, and enjoying at the same time the pleasure of swimming, I returned; and loosing from the stake the string with the little stick which was fastened to it, went again into the water, where I found, that, lying on my back and holding the stick in my hands, I was drawn along the surface of the water in a very agreeable manner. Having then engaged another boy to carry my clothes round the pond, to a place which I pointed out to him on the other side, I began to cross the pond with my kite, which carried me quite over without the least fatigue, and with the greatest pleasure imaginable. I was only obliged occasionally to halt a little in my course, and resist its progress, when it appeared that, by following too quick,

quick, I lowered the kite too much; by doing which occasionally I made it rise again.—I have never since that time practised this singular mode of swimming, though I think it not impossible to cross in this manner from Dover to Calais. The packet-boat, however, is still preferable.

NEW MODE OF BATHING.

EXTRACTS OF LETTERS TO M. DUBOURG.

London, July 28, 1768.

I GREATLY approve the epithet which you give, in your letter of the 8th of June, to the new method of treating the small-pox, which you call the *tonic* or bracing method ; I will take occasion, from it, to mention a practice to which I have accustomed myself. You know the cold bath has long been in vogue here as a tonic ; but the shock of the cold water has always appeared to me, generally speaking, as too violent, and I have found it much more agreeable to my constitution to bathe in another element, I mean cold air. With this view
I rise

I rise early almost every morning, and sit in my chamber without any clothes whatever, half an hour or an hour, according to the season, either reading or writing. This practice is not in the least painful, but, on the contrary, agreeable; and if I return to bed afterwards, before I dress myself, as sometimes happens, I make a supplement of my night's rest of one or two hours of the most pleasing sleep that can be imagined. I find no ill consequences whatever resulting from it, and that at least it does not injure my health, if it does not in fact contribute much to its preservation.— I shall therefore call it for the future a *bracing or tonic bath*.

March 10, 1793.

I shall not attempt to explain why damp clothes occasion colds, rather than wet ones, because I doubt the fact; I imagine that neither the one nor the

other contribute to this effect, and that the causes of colds are totally independent of wet and even of cold. I propose writing a short paper on this subject, the first moment of leisure I have at my disposal.—In the mean time I can only say, that, having some suspicions that the common notion, which attributes to cold the property of stopping the pores and obstructing perspiration, was ill founded, I engaged a young physician, who is making some experiments with Sancerrias's balance, to estimate the different proportions of his perspiration, when remaining one hour quite naked, and another warmly clothed. He pursued the experiment in this alternate manner for eight hours successively, and found his perspiration almost double during those hours in which he was naked.

OBSERVATIONS ON THE GENERALLY
PREVAILING DOCTRINES OF LIFE
AND DEATH.

To the same.

YOUR observations on the causes of death, and the experiments which you propose for recalling to life those who appear to be killed by lightning, demonstrate equally your sagacity and humanity. It appears that the doctrines of life and death, in general, are yet but little understood.

A toad buried in sand will live, it is said, until the sand becomes petrified; and then, being inclosed in the stone, it may still live for we know not how many ages. The facts which are cited in support of this opinion, are too numerous

and too circumstantial not to deserve a certain degree of credit. As we are accustomed to see all the animals with which we are acquainted eat and drink, it appears to us difficult to conceive how a toad can be supported in such a dungeon. But if we reflect, that the necessity of nourishment, which animals experience in their ordinary state, proceeds from the continual waste of their substance by perspiration; it will appear less incredible, that some animals in a torpid state, perspiring less because they use no exercise, should have less need of aliment; and that others, which are covered with scales or shells, which stop perspiration, such as land and sea turtles, serpents, and some species of fish, should be able to subsist a considerable time without any nourishment whatever.—A plant, with its flowers, fades and dies immediately, if exposed to the air without having its roots immersed in a humid soil, from
which

which it may draw a sufficient quantity of moisture, to supply that which exhales from its substance, and is carried off continually by the air. Perhaps, however, if it were buried in quicksilver, it might preserve, for a considerable space of time, its vegetable life, its smell and colour. If this be the case, it might prove a commodious method of transporting from distant countries those delicate plants which are unable to sustain the inclemency of the weather at sea, and which require particular care and attention.

I have seen an instance of common flies preserved in a manner somewhat similar. They had been drowned in Madeira wine, apparently about the time when it was bottled in Virginia to be sent to London. At the opening of one of the bottles, at the house of a friend where I was, three drowned flies fell into the first glass which was filled. Having

heard it remarked that drowned flies were capable of being revived by the rays of the sun, I proposed making the experiment upon these. They were therefore exposed to the sun, upon a sieve which had been employed to strain them out of the wine. In less than three hours two of them began by degrees to recover life. They commenced by some convulsive motions in the thighs, and at length they raised themselves upon their legs, wiped their eyes with their fore feet, beat and brushed their wings with their hind feet, and soon after began to fly, finding themselves in Old England, without knowing how they came thither. The third continued lifeless until sun-set, when, losing all hopes of him, he was thrown away.

I wish it were possible, from this instance, to invent a method of embalming drowned persons, in such a manner that they might be recalled to life at any period,
however

however distant; for, having a very ardent desire to see and observe the state of America an hundred years hence, I should prefer, to an ordinary death, the being immersed in a cask of Madeira wine, with a few friends, until that time, then to be recalled to life by the solar warmth of my dear country. But since, in all probability, we live in an age too early, and too near the infancy of science, to see such an art brought in our time to its perfection; I must, for the present, content myself with the treat, which you are so kind as to promise me, of the resurrection of a fowl or a turkey-cock.

PRECAUTIONS *to be used by those who are*
about to undertake A SEA VOYAGE.

WHEN you intend to take a long voyage, nothing is better than to keep it a secret till the moment of your departure. Without this, you will be continually interrupted and tormented by visits from friends and acquaintances, who not only make you lose your valuable time, but make you forget a thousand things which you wish to remember; so that when you are embarked, and fairly at sea, you recollect, with much uneasiness, affairs which you have not terminated, accounts that you have not settled, and a number of things which you proposed to carry with you, and which you find the want of every moment. Would it not be attended

with the best consequences to reform such a custom, and to suffer a traveller, without deranging him, to make his preparations in quietness, to set apart a few days, when these are finished, to take leave of his friends, and to receive their good wishes for his happy return?

It is not always in one's power to choose a captain; though great part of the pleasure and happiness of the passage depends upon this choice, and though one must for a time be confined to his company, and be in some measure under his command. If he is a social sensible man, obliging, and of a good disposition, you will be so much the happier. One sometimes meets with people of this description, but they are not common: however, if yours be not of this number, if he be a good seaman, attentive, careful, and active in the management of his vessel, you must dispense with the rest, for these are the most essential qualities.

Whatever

Whatever right you may have, by your agreement with him, to the provisions he has taken on board for the use of the passengers, it is always proper to have some private store, which you may make use of occasionally. You ought, therefore, to provide good water, that of the ship being often bad : but you must put it into bottles, without which you cannot expect to preserve it sweet. You ought also to carry with you good tea, ground coffee, chocolate, wine of that sort which you like best, cyder, dried raisins, almonds, sugar, capillaire, citrons, rum, eggs dipped in oil, portable soup, bread twice baked. With regard to poultry, it is almost useless to carry any with you, unless you resolve to undertake the office of feeding and fattening them yourself. With the little care which is taken of them on board ship, they are almost all sickly, and their flesh is as tough as leather.

All sailors entertain an opinion, which has undoubtedly originated formerly from a want of water, and when it has been found necessary to be sparing of it, that poultry never know when they have drunk enough ; and that when water is given them at discretion, they generally kill themselves by drinking beyond measure. In consequence of this opinion, they give them water only once in two days, and even then in small quantities ; but as they pour this water into troughs inclining on one side, which occasions it to run to the lower part, it thence happens that they are obliged to mount one upon the back of another in order to reach it ; and there are some which cannot even dip their beaks in it. Thus continually tantalized and tormented by thirst, they are unable to digest their food, which is very dry, and they soon fall sick and die. Some of them are found thus every morning, and are
thrown

thrown into the sea ; whilst those which are killed for the table are scarcely fit to be eaten. To remedy this inconvenience, it will be necessary to divide their troughs into small compartments, in such a manner that each of them may be capable of containing water ; but this is seldom or never done. On this account, sheep and hogs are to be considered as the best fresh provision that one can have at sea ; mutton there being in general very good, and pork excellent.

It may happen that some of the provisions and stores which I have recommended may become almost useless, by the care which the captain has taken to lay in a proper stock ; but in such a case you may dispose of it to relieve the poor passengers, who, paying less for their passage, are stowed among the common sailors, and have no right to the captain's provisions, except such part of them as is used for feeding the crew. These passengers

sengers are sometimes sick, melancholy, and dejected ; and there are often women and children among them, neither of whom have any opportunity of procuring those things which I have mentioned, and of which, perhaps, they have the greatest need. By distributing amongst them a part of your superfluity, you may be of the greatest assistance to them. You may restore their health, save their lives, and in short render them happy ; which always affords the liveliest sensation to a feeling mind.

The most disagreeable thing at sea is the cookery ; for there is not, properly speaking, any professed cook on board. The worst sailor is generally chosen for that purpose, who for the most part is equally dirty. Hence comes the proverb used among the English sailors, that *God sends meat, and the Devil sends cooks*. Those, however, who have a better opinion of Providence, will think otherwise.

otherwise. Knowing that sea air, and the exercise or motion which they receive from the rolling of the ship, have a wonderful effect in whetting the appetite, they will say, that Providence has given sailors bad cooks to prevent them from eating too much ; or that, knowing they would have bad cooks, he has given them a good appetite to prevent them from dying with hunger. However, if you have no confidence in these succours of Providence, you may yourself, with a lamp and a boiler, by the help of a little spirits of wine, prepare some food, such as soup, hash, &c. A small oven made of tin-plate is not a bad piece of furniture : your servant may roast in it a piece of mutton or pork. If you are ever tempted to eat salt beef, which is often very good, you will find that cyder is the best liquor to quench the thirst generally caused by salt meat or salt fish. Sea biscuit, which is too
hard

hard for the teeth of some people, may be softened by steeping it; but bread double-baked is the best; for, being made of good loaf-bread cut into slices, and baked a second time, it readily imbibes water, becomes soft, and is easily digested: it consequently forms excellent nourishment, much superior to that of biscuit, which has not been fermented.

I must here observe, that this double-baked bread was originally the real biscuit prepared to keep at sea; for the word *biscuit*, in French, signifies twice baked*. Pease often boil badly, and do not become soft: in such case, by putting a two-pound shot into the kettle, the rolling of the vessel, by means of this bullet, will convert the pease into a kind of porridge, like mustard.

Having often seen soup, when put

* It is derived from *bis* again, and *cuit* baked.

upon the table at sea in broad flat dishes, thrown out on every side by the rolling of the vessel, I have wished that our tin-men would make our soup-basons with divisions or compartments; forming small plates, proper for containing soup for one person only. By this disposition, the soup, in an extraordinary roll, would not be thrown out of the plate, and would not fall into the breasts of those who are at table, and scald them.—Having entertained you with these things of little importance, permit me now to conclude with some general reflections upon navigation.

When navigation is employed only for transporting necessary provisions from one country, where they abound, to another where they are wanting; when by this it prevents famines, which were so frequent and so fatal before it was invented and became so common; we cannot help considering it as one of those
arts

arts which contribute most to the happiness of mankind.—But when it is employed to transport things of no utility, or articles merely of luxury, it is then uncertain whether the advantages resulting from it are sufficient to counterbalance the misfortunes it occasions by exposing the lives of so many individuals upon the vast ocean. And when it is used to plunder vessels and transport slaves, it is evidently only the dreadful means of increasing those calamities which afflict human nature.

One is astonished to think on the number of vessels and men who are daily exposed in going to bring tea from China, coffee from Arabia, and sugar and tobacco from America; all commodities which our ancestors lived very well without. The sugar-trade employs nearly a thousand vessels; and that of tobacco almost the same number. With regard to the utility of tobacco, little

can be said ; and with regard to sugar, how much more meritorious would it be to sacrifice the momentary pleasure which we receive from drinking it once or twice a-day in our tea, than to encourage the numberless cruelties that are continually exercised in order to procure it us !

A celebrated French moralist said, that, when he considered the wars which we foment in Africa to get negroes ; the great number who of course perish in these wars ; the multitude of those wretches who die in their passage, by disease, bad air, and bad provisions ; and lastly, how many perish by the cruel treatment they meet with in a state of slavery ; when he saw a bit of sugar, he could not help imagining it to be covered with spots of human blood. But, had he added to these considerations the wars which we carry on against one another, to take and retake the islands that
produce

produce this commodity, he would not have seen the sugar simply *spotted* with blood, he would have beheld it entirely tinged with it.

These wars make the maritime powers of Europe, and the inhabitants of Paris and London, pay much dearer for their sugar than those of Vienna, though they are almost three hundred leagues distant from the sea. A pound of sugar, indeed, costs the former not only the price which they give for it, but also what they pay in taxes, necessary to support those fleets and armies which serve to defend and protect the countries that produce it.

ON LUXURY, IDLENESS, AND INDUSTRY :

*From a Letter to Benjamin Vaughan, Esq.**
written in 1784.

IT is wonderful how preposterously the affairs of this world are managed. Naturally one would imagine, that the interest of a few individuals should give way to general interest ; but individuals manage their affairs with so much more application, industry, and address, than the public do theirs, that general interest most commonly gives way to particular. We assemble parliaments and councils, to have the benefit of their collected wisdom ; but we necessarily have, at the same time, the inconvenience of their col-

* Present member of parliament for the borough of Calne, in Wiltshire, between whom and our author there subsisted a very close friendship.

lected passions, prejudices, and private interests. By the help of these, artful men overpower their wisdom, and dupe its possessors : and if we may judge by the acts, arrets, and edicts, all the world over, for regulating commerce, an assembly of great men is the greatest fool upon earth.

I have not yet, indeed, thought of a remedy for luxury. I am not sure that in a great state it is capable of a remedy ; nor that the evil is in itself always so great as it is represented. Suppose we include in the definition of luxury all unnecessary expence, and then let us consider whether laws to prevent such expence are possible to be executed in a great country ; and whether, if they could be executed, our people generally would be happier, or even richer. Is not the hope of being one day able to purchase and enjoy luxuries a great spur to labour and industry ? May not luxury

therefore produce more than it consumes, if, without such a spur, people would be, as they are naturally enough inclined to be, lazy and indolent? To this purpose I remember a circumstance. The skipper of a shallop, employed between Cape-May and Philadelphia, had done us some small service, for which he refused to be paid. My wife, understanding that he had a daughter, sent her a present of a new-fashioned cap. Three years after, this skipper being at my house with an old farmer of Cape-May, his passenger, he mentioned the cap, and how much his daughter had been pleased with it. “But (said he) it proved a
“dear cap to our congregation.”—
“How so?”—“When my daughter
“appeared with it at meeting, it was so
“much admired, that all the girls re-
“solved to get such caps from Phila-
“delphia; and my wife and I com-
“puted that the whole could not have

“cost less than a hundred pounds.”—
“True (said the farmer), but you do not
“tell all the story. I think the cap was
“nevertheless an advantage to us; for
“it was the first thing that put our girls
“upon knitting worsted mittens for sale
“at Philadelphia, that they might have
“wherewithal to buy caps and ribbons
“there; and you know that that indus-
“try has continued, and is likely to
“continue and increase to a much
“greater value, and answer better pur-
“poses.”—Upon the whole, I was more
reconciled to this little piece of luxury,
since not only the girls were made hap-
pier by having fine caps, but the Phila-
delphians by the supply of warm mit-
tens.

In our commercial towns upon the
sea coast, fortunes will occasionally be
made. Some of those who grow rich
will be prudent, live within bounds, and
preserve what they have gained for their

posterity : others, fond of shewing their wealth, will be extravagant, and ruin themselves. Laws cannot prevent this : and perhaps it is not always an evil to the public. A shilling spent idly by a fool, may be picked up by a wiser person, who knows better what to do with it. It is therefore not lost. A vain silly fellow builds a fine house, furnishes it richly, lives in it expensively, and in a few years ruins himself : but the masons, carpenters, smiths, and other honest tradesmen, have been by his employ assisted in maintaining and raising their families ; the farmer has been paid for his labour, and encouraged ; and the estate is now in better hands.—In some cases, indeed, certain modes of luxury may be a public evil, in the same manner as it is a private one. If there be a nation, for instance, that exports its beef and linen, to pay for the importation of claret and porter, while a great part of its people
live

live upon potatoes, and wear no shirts; wherein does it differ from the sot who lets his family starve, and sells his clothes to buy drink? Our American commerce is, I confess, a little in this way. We sell our victuals to the islands for rum and sugar; the substantial necessaries of life for superfluities. But we have plenty, and live well nevertheless; though, by being soberer, we might be richer.

The vast quantity of forest land we have yet to clear, and put in order for cultivation, will for a long time keep the body of our nation laborious and frugal. Forming an opinion of our people and their manners by what is seen among the inhabitants of the sea-ports, is judging from an improper sample. The people of the trading towns may be rich and luxurious, while the country possesses all the virtues that tend to promote happiness and public prosperity. Those
towns

towns are not much regarded by the country; they are hardly considered as an essential part of the states; and the experience of the last war has shewn, that their being in the possession of the enemy did not necessarily draw on the subjection of the country; which bravely continued to maintain its freedom and independence notwithstanding.

It has been computed by some political arithmetician, that if every man and woman would work for four hours each day on something useful, that labour would produce sufficient to procure all the necessaries and comforts of life; want and misery would be banished out of the world, and the rest of the twenty-four hours might be leisure and pleasure.

What occasions then so much want and misery? It is the employment of men and women in works, that produce neither the necessaries nor conveniences
of

of life, who, with those who do nothing, consume necessaries raised by the labourious. To explain this :

The first elements of wealth are obtained by labour, from the earth and waters. I have land, and raise corn. With this if I feed a family that does nothing, my corn will be consumed, and at the end of the year I shall be no richer than I was at the beginning. But if, while I feed them, I employ them, some in spinning, others in making bricks, &c. for building, the value of my corn will be arrested and remain with me, and at the end of the year we may be all better clothed and better lodged. And if, instead of employing a man I feed in making bricks, I employ him in fiddling for me, the corn he eats is gone, and no part of his manufacture remains to augment the wealth and convenience of the family : I shall therefore be the poorer for this fiddling man, unless the rest of
my

my family work more, or eat less, to make up the deficiency he occasions.

Look round the world, and see the millions employed in doing nothing, or in something that amounts to nothing when the necessaries and conveniences of life are in question. What is the bulk of commerce, for which we fight and destroy each other, but the toil of millions for superfluities, to the great hazard and loss of many lives by the constant dangers of the sea? How much labour is spent in building and fitting great ships, to go to China and Arabia for tea and coffee, to the West Indies or sugar, to America for tobacco! These things cannot be called the necessaries of life, for our ancestors lived very comfortably without them.

A question may be asked: Could all these people now employed in raising, making, or carrying superfluities, be subsisted by raising necessaries? I think
they

they might. The world is large, and a great part of it still uncultivated. Many hundred millions of acres in Asia, Africa, and America, are still in a forest; and a great deal even in Europe. On a hundred acres of this forest a man might become a substantial farmer; and a hundred thousand men employed in clearing each his hundred acres, would hardly brighten a spot big enough to be visible from the moon, unless with Herschel's telescope; so vast are the regions still in wood.

It is however some comfort to reflect, that, upon the whole, the quantity of industry and prudence among mankind exceeds the quantity of idleness and folly. Hence the increase of good buildings, farms cultivated, and populous cities filled with wealth, all over Europe, which a few ages since were only to be found on the coasts of the Mediterranean; and this notwithstanding the
mad

mad wars continually raging, by which are often destroyed in one year the works of many years peace. So that we may hope, the luxury of a few merchants on the coast will not be the ruin of America.

One reflection more, and I will end this long rambling letter. Almost all the parts of our bodies require some expence. The feet demand shoes; the legs stockings; the rest of the body clothing; and the belly a good deal of victuals. Our eyes, though exceedingly useful, ask, when reasonable, only the cheap assistance of spectacles, which could not much impair our finances. But the eyes of other people are the eyes that ruin us. If all but myself were blind, I should want neither fine clothes, fine houses, nor fine furniture.

ON

ON THE SLAVE TRADE.

READING in the newspapers the speech of Mr. Jackson in congress, against meddling with the affair of slavery, or attempting to mend the condition of slaves, it put me in mind of a similar speech, made about one hundred years since, by Sidi Mehemet Ibrahim, a member of the divan of Algiers, which may be seen in Martin's account of his consulship, 1687. It was against granting the petition of the sect called *Erika*, or *Purists*, who prayed for the abolition of piracy and slavery, as being unjust. — Mr. Jackson does not quote it; perhaps he has not seen it. If, therefore, some of its reasonings are to be found in his eloquent speech, it may only shew that men's interests operate, and are operated on,

on, with surprising similarity, in all countries and climates, whenever they are under similar circumstances. The African speech, as translated, is as follows :

“ Alla Bismillah, &c. God is great, and Mahomet is his prophet.

“ Have these Erika considered the consequences of granting their petition? If we cease our cruises against the Christians, how shall we be furnished with the commodities their countries produce, and which are so necessary for us? If we forbear to make slaves of their people, who, in this hot climate, are to cultivate our lands? Who are to perform the common labours of our city, and of our families? Must we not then be our own slaves? And is there not more compassion and more favour due to us Mussulmen, than to those Christian dogs? We have now above fifty thousand slaves in and near
Algiers.

Algiers. This number, if not kept up by fresh supplies, will soon diminish, and be gradually annihilated. If, then, we cease taking and plundering the infidel ships, and making slaves of the seamen and passengers, our lands will become of no value, for want of cultivation; the rents of houses in the city will sink one half; and the revenues of government, arising from the share of prizes, must be totally destroyed.—And for what? To gratify the whim of a whimsical sect, who would have us not only forbear making more slaves, but even manumit those we have. But who is to indemnify their masters for the loss? Will the state do it? Is our treasury sufficient? Will the Erika do it? Can they do it? Or would they, to do what they think justice to the slaves, do a greater injustice to the owners? And if we set our slaves free, what is to be done with them? Few of them will return to their native countries; they know too well the

greater hardships they must there be subject to. They will not embrace our holy religion: they will not adopt our manners: our people will not pollute themselves by intermarrying with them. Must we maintain them as beggars in our streets; or suffer our properties to be the prey of their pillage? for men accustomed to slavery will not work for a livelihood, when not compelled.—And what is there so pitiable in their present condition? Were they not slaves in their own countries? Are not Spain, Portugal, France, and the Italian states, governed by despots, who hold all their subjects in slavery, without exception? Even England treats her sailors as slaves; for they are, whenever the government pleases, seized and confined in ships of war, condemned not only to work, but to fight for small wages, or a mere subsistence, not better than our slaves are allowed by us. Is their condition then
made

made worse by their falling into our hands? No; they have only exchanged one slavery for another; and I may say a better: for here they are brought into a land where the sun of Islamism gives forth its light, and shines in full splendour, and they have an opportunity of making themselves acquainted with the true doctrine, and thereby saving their immortal souls. Those who remain at home, have not that happiness. Sending the slaves home, then, would be sending them out of light into darkness.

“I repeat the question, What is to be done with them? I have heard it suggested, that they may be planted in the wilderness, where there is plenty of land for them to subsist on, and where they may flourish as a free state.—But they are, I doubt, too little disposed to labour without compulsion, as well as too ignorant to establish good government: and the wild Arabs would soon

molest and destroy, or again enslave them. While serving us, we take care to provide them with every thing ; and they are treated with humanity. The labourers in their own countries are, as I am informed, worse fed, lodged, and clothed. The condition of most of them therefore is already mended, and requires no farther improvement. Here their lives are in safety. They are not liable to be impressed for soldiers, and forced to cut one another's Christian throats, as in the wars of their own countries. If some of the religious mad bigots, who now tease us with their silly petitions, have, in a fit of blind zeal, freed their slaves, it was not generosity, it was not humanity, that moved them to the action ; it was from the conscious burthen of a load of sins, and hope, from the supposed merits of so good a work, to be excused from damnation.—How grossly are they mistaken, in imagining
slavery

slavery to be disavowed by the Alcoran ! Are not the two precepts, to quote no more, “ Masters, treat your slaves with kindness—Slaves, serve your masters with cheerfulness and fidelity,” clear proofs to the contrary ? Nor can the plundering of infidels be in that sacred book forbidden ; since it is well known from it, that God has given the world, and all that it contains, to his faithful Mussulmen, who are to enjoy it, of right, as fast as they can conquer it. Let us then hear no more of this detestable proposition, the manumission of Christian slaves, the adoption of which would, by depreciating our lands and houses, and thereby depriving so many good citizens of their properties, create universal discontent, and provoke insurrections, to the endangering of government, and producing general confusion. I have, therefore, no doubt that this wise council will prefer the comfort and happiness

of a whole nation of true believers, to the whim of a few Erika, and dismiss their petition."

The result was, as Martin tells us, that the Divan came to this resolution :
" That the doctrine, that the plundering
" and enslaving the Christians is unjust,
" is at best problematical ; but that it is
" the interest of this state to continue the
" practice, is clear ; therefore let the
" petition be rejected."——And it was rejected accordingly.

And since like motives are apt to produce in the minds of men like opinions and resolutions, may we not venture to predict, from this account, that the petitions to the parliament of England for abolishing the slave trade, to say nothing of other legislatures, and the debates upon them, will have a similar conclusion ?

March 23, 1790,

HISTORICUS,

OBSERV.

OBSERVATIONS ON WAR.

BY the original law of nations, war and extirpation were the punishment of injury. Humanizing by degrees, it admitted slavery instead of death: a farther step was, the exchange of prisoners instead of slavery: another, to respect more the property of private persons under conquest, and be content with acquired dominion. Why should not this law of nations go on improving? Ages have intervened between its several steps: but as knowledge of late increases rapidly, why should not those steps be quickened? Why should it not be agreed to, as the future law of nations, that in any war hereafter the following description of men should be undisturbed, have

the protection of both sides, and be permitted to follow their employments in security? viz.

1. Cultivators of the earth, because they labour for the subsistence of mankind.

2. Fishermen, for the same reason.

3. Merchants and traders in unarmed ships, who accommodate different nations by communicating and exchanging the necessaries and conveniences of life.

4. Artists and mechanics, inhabiting and working in open towns.

It is hardly necessary to add, that the hospitals of enemies should be unmolested—they ought to be assisted. It is for the interest of humanity in general, that the occasions of war, and the inducements to it, should be diminished. If rapine be abolished, one of the encouragements to war is taken away; and peace therefore more likely to continue and be lasting.

The

The practice of robbing merchants on the high seas—a remnant of the ancient piracy—though it may be accidentally beneficial to particular persons, is far from being profitable to all engaged in it, or to the nation that authorises it. In the beginning of a war some rich ships are surpris'd and taken. This encourages the first adventurers to fit out more armed vessels; and many others to do the same. But the enemy at the same time become more careful; arm their merchant ships better, and render them not so easy to be taken: they go also more under the protection of convoys. Thus, while the privateers to take them are multiplied, the vessels subject to be taken, and the chances of profit, are diminished; so that many cruises are made wherein the expences overgo the gains; and, as is the case in other lotteries, though particulars have got prizes, the mass of adventurers are

are losers, the whole expence of fitting out all the privateers during a war being much greater than the whole amount of goods taken.

Then there is the national loss of all the labour of so many men during the time they have been employed in robbing; who besides spend what they get, in riot, drunkenness, and debauchery; lose their habits of industry; are rarely fit for any sober business after a peace, and serve only to increase the number of highwaymen and housebreakers. Even the undertakers who have been fortunate, are, by sudden wealth, led into expensive living, the habit of which continues when the means of supporting it cease, and finally ruins them: a just punishment for their having wantonly and unfeelingly ruined many honest, innocent traders and their families, whose substance was employed in serving the common interest of mankind.

ON THE
IMPRESS OF SEAMEN.

Notes copied from Dr. Franklin's writing in pencil in the margin of Judge Foster's celebrated argument in favour of the IMPRESSING OF SEAMEN (published in the folio edition of his works).

JUDGE Foster, p. 158. “ Every
“ Man.”—The conclusion here from the
whole to a part, does not seem to be good
logic. If the alphabet should say, Let us
all fight for the defence of the whole;
that is equal, and may therefore be just.
But if they should say, Let A B C and D
go out and fight for us, while we stay at
home and sleep in whole skins; that is
not equal, and therefore cannot be just.

Ib.

Ib. “Employ.”—If you please. The word signifies engaging a man to work for me, by offering him such wages as are sufficient to induce him to prefer my service. This is very different from compelling him to work on such terms as I think proper.

Ib. “This service and employment, &c.”—These are false facts. His employments and service are not the same.—Under the merchant he goes in an unarmed vessel, not obliged to fight, but to transport merchandize. In the king’s service he is obliged to fight, and to hazard all the dangers of battle. Sickneſs on board of king’s ſhips is alſo more common and more mortal. The merchant’s ſervice too he can quit at the end of the voyage; not the king’s. Alſo, the merchant’s wages are much higher.

Ib. “I am very ſenſible, &c.”—
Here

Here are two things put in comparison that are not comparable : viz. injury to seamen, and inconvenience to trade. Inconvenience to the whole trade of a nation will not justify injustice to a single seaman. If the trade would suffer without his service, it is able and ought to be willing to offer him such wages as may induce him to afford his service voluntarily.

Page 159. " Private mischief must be borne with patience, for preventing a national calamity."—Where is this maxim in law and good policy to be found ? And how can that be a maxim which is not consistent with common sense ? If the maxim had been, that private mischiefs, which prevent a national calamity, ought to be generously compensated by the nation, one might understand it : but that such private mischiefs are only to be borne with patience, is absurd !

Ib. “The expedient, &c. And, &c.” (Paragraphs 2 and 3).—Twenty ineffectual or inconvenient schemes will not justify one that is unjust.

Ib. “Upon the foot of, &c.”—Your reasoning, indeed, like a lie, stands but upon one *foot*; truth upon two.

Page 160. “Full wages.”—Probably the same they had in the merchant’s service.

Page 174. “I hardly admit, &c.” (Paragraph 5).—When this author speaks of impressing, page 158, he diminishes the horror of the practice as much as possible, by presenting to the mind one sailor only suffering a “*hardship*” (as he tenderly calls it) in some “*particular cases*” only; and he places against this private mischief the inconvenience to the trade of the kingdom.—But if, as he supposes is often the case, the sailor who is pressed, and ob-
liged

liged to serve for the defence of trade, at the rate of twenty-five shillings a month, could get three pounds fifteen shillings in the merchant's service, you take from him fifty shillings a month; and if you have 100,000 in your service, you rob this honest industrious part of society and their poor families of 25,000*l.* per month, or three millions a year, and at the same time oblige them to hazard their lives in fighting for the defence of your trade; to the defence of which all ought indeed to contribute (and sailors among the rest) in proportion to their profits by it: but this three millions is more than their share, if they did not pay with their persons; but when you force that, methinks you should excuse the other.

But it may be said, to give the king's seamen merchant's wages would cost the nation too much, and call for more taxes.

The

The question then will amount to this : whether it be just in a community, that the richer part should compel the poorer to fight in defence of them and their properties, for such wages as they think fit to allow, and punish them if they refuse ? Our author tells us that it is “*legal.*” I have not law enough to dispute his authorities, but I cannot persuade myself that it is equitable. I will, however, own for the present, that it may be lawful when necessary ; but then I contend that it may be used so as to produce the same good effects—*the public security*—without doing so much intolerable injustice as attends the impressing common seamen.—In order to be better understood, I would premise two things : First, that voluntary seamen may be had for the service, if they were sufficiently paid. The proof is, that to serve in the same ship, and incur the same dangers,

you

you have no occasion to impress captains, lieutenants, second lieutenants, midshipmen, purfers, nor many other officers. Why, but that the profits of their places, or the emoluments expected, are sufficient inducements? The business then is, to find money, by impressing, sufficient to make the sailors all volunteers, as well as their officers; and this without any fresh burthen upon trade.—The second of my premises is, that twenty-five shillings a month, with his share of the salt beef, pork, and peas-pudding, being found sufficient for the subsistence of a hard-working seaman, it will certainly be so for a sedentary scholar or gentleman. I would then propose to form a treasury, out of which encouragements to seamen should be paid. To fill this treasury, I would impress a number of civil officers who at present have great salaries, oblige them to serve in

their respective offices for twenty-five shillings a month with their shares of mess provisions, and throw the rest of their salaries into the seamen's treasury. If such a press-warrant were given me to execute, the first I would press should be a Recorder of Bristol, or a Mr. Justice Foster, because I might have need of his edifying example, to shew how much impressing ought to be borne with; for he would certainly find, that though to be reduced to twenty five shillings a month might be a "*private mischief*," yet that, agreeably to his maxim of law and good policy, it "*ought to be borne with patience*," for preventing a national calamity. Then I would press the rest of the Judges; and opening the red book, I would press every civil officer of government from 50l. a year salary, up to 50,000l. which would throw an immense sum into our treasury : and these gentlemen

gentlemen could not complain, since they would receive twenty-five shillings a month, and their rations; and this without being obliged to fight. Lastly, I think I would impress ***

ON THE CRIMINAL LAWS, AND THE
PRACTICE OF PRIVATEERING.

Letter to Benjamin Vanghan, Esq.

My dear Friend,

March 14th, 1785.

AMONG the pamphlets you lately sent me, was one, entitled, *Thoughts on Executive Justice*. In return for that, I send you a French one on the same subject, *Observations concernant l'Exécution de l'Article II. de la Déclaration sur le Vol*. They are both addressed to the judges, but written, as you will see, in a very different spirit. The English author is for hanging *all* thieves. The Frenchman is for proportioning punishments to offences.

If we really believe, as we profess to believe, that the law of Moses was the law of God, the dictate of divine wisdom,

dom, infinitely superior to human; on what principles do we ordain death as the punishment of an offence, which, according to that law, was only to be punished by a restitution of fourfold? To put a man to death for an offence which does not deserve death, is it not a murder? And, as the French writer says, *Doit-on punir un délit contre la société par un crime contre la nature?*

Superfluous property is the creature of society. Simple and mild laws were sufficient to guard the property that was merely necessary. The savage's bow, his hatchet, and his coat of skins, were sufficiently secured, without law, by the fear of personal resentment and retaliation. When, by virtue of the first laws, part of the society accumulated wealth and grew powerful, they enacted others more severe, and would protect their property at the expence of humanity. This was abusing their power, and com-

menacing a tyranny. If a savage, before he entered into society, had been told—
“ Your neighbour, by this means, may
“ become owner of an hundred deer ;
“ but if your brother, or your son, or
“ yourself, having no deer of your own,
“ and being hungry, should kill one, an
“ infamous death must be the consequence :” he would probably have preferred his liberty, and his common right of killing any deer, to all the advantages of society that might be proposed to him.

That it is better a hundred guilty persons should escape, than that one innocent person should suffer, is a maxim that has been long and generally approved ; never, that I know of, controverted. Even the sanguinary author of the *Thoughts* agrees to it, adding well,
“ that the very thought of *injured* innocence, and much more that of *suffering*
“ innocence, must awaken all our tenderest

“ dearest and most compassionate feelings,
“ and at the same time raise our highest
“ indignation against the instruments of
“ it. But,” he adds, “ there is no danger
“ of *either*, from a strict adherence to
“ the laws.”—Really!—Is it then im-
possible to make an unjust law? and if
the law itself be unjust, may it not be
the very “ instrument” which ought “ to
“ raise the author’s, and every body’s
“ highest indignation?” I see, in the last
newspapers from London, that a woman
is capitally convicted at the Old Bailey for
privately stealing out of a shop some gauze,
value fourteen shillings and three-pence:
Is there any proportion between the in-
jury done by a theft, value fourteen shil-
lings and three pence, and the punish-
ment of a human creature, by death, on
a gibbet? Might not that woman, by
her labour, have made the reparation or-
dained by God, in paying fourfold? Is
not all punishment inflicted beyond the

merit of the offence, so much punishment of innocence? In this light, how vast is the annual quantity, of not only *injured* but *suffering* innocence, in almost all the civilized states of Europe!

But it seems to have been thought, that this kind of innocence may be punished by way of *preventing* crimes. I have read, indeed, of a cruel Turk in Barbary, who, whenever he bought a new Christian slave, ordered him immediately to be hung up by the legs, and to receive a hundred blows of a cudgel on the soles of his feet, that the severe sense of the punishment, and fear of incurring it thereafter, might prevent the faults that should merit it. Our author himself would hardly approve entirely of this Turk's conduct in the government of slaves; and yet he appears to recommend something like it for the government of English subjects, when he applauds the reply of Judge Burnet to
the

the convict horse-stealer ; who being asked what he had to say why judgment of death should not pass against him, and answering, that it was hard to hang a man for *only* stealing a horse, was told by the judge, “ Man, thou art not to be “ hanged *only* for stealing a horse, but “ that horses may not be stolen.” The man’s answer, if candidly examined, will, I imagine, appear reasonable, as being founded on the eternal principle of justice and equity, that punishments should be proportioned to offences; and the judge’s reply brutal and unreasonable; though the writer “ wishes all “ judges to carry it with them whenever “ they go the circuit, and to bear it in “ their minds, as containing a wise reason for all the penal statutes which “ they are called upon to put in execution. It at once illustrates,” says he, “ the true grounds and reasons of all capital “ pital

“ pital punishments whatsoever, namely,
“ that every man’s property, as well as
“ his life, may be held sacred and invio-
“ late.” Is there then no difference in
value between property and life? If I
think it right that the crime of murder
should be punished with death, not only
as an equal punishment of the crime, but
to prevent other murders, does it follow
that I must approve of inflicting the
same punishment for a little invasion on
my property by theft? If I am not my-
self so barbarous, so bloody-minded,
and revengeful, as to kill a fellow-crea-
ture for stealing from me fourteen shil-
lings and three-pence, how can I ap-
prove of a law that does it? Montef-
quieu, who was himself a judge, endea-
vours to impress other maxims. He
must have known what humane judges
feel on such occasions, and what the ef-
fects of those feelings; and, so far from
thinking

thinking that severe and excessive punishments prevent crimes, he asserts, as quoted by our French writer, that

“ L’atrocité des loix en empêche l’exécution.

“ Lorsque la peine est sans mesure, on est souvent obligé de lui préférer l’impunité.

“ La cause de tous les relâchemens vient de l’impunité des crimes, et non de la modération des peines.”

It is said by those who know Europe generally, that there are more thefts committed and punished annually in England, than in all the other nations put together. If this be so, there must be a cause or causes for such depravity in our common people. May not one be the deficiency of justice and morality in our national government, manifested in our oppressive conduct to subjects, and unjust wars on our neighbours? View the long persisted in, unjust, monopolizing treatment of Ireland, at length acknowledged!

ledged ! View the plundering government exercised by our merchants in the Indies ; the confiscating war made upon the American colonies ; and, to say nothing of those upon France and Spain, view the late war upon Holland, which was seen by impartial Europe in no other light than that of a war of rapine and pillage ; the hopes of an immense and easy prey being its only apparent, and probably its true and real motive and encouragement. Justice is as strictly due between neighbour nations as between neighbour citizens. A highwayman is as much a robber when he plunders in a gang, as when single ; and a nation that makes an unjust war is only a great gang. After employing your people in robbing the Dutch, is it strange that, being put out of that employ by peace, they still continue robbing, and rob one another ? *Piraterie*, as the French call it, or privateering, is the universal

versal bent of the English nation, at home and abroad, wherever settled. No less than seven hundred privateers were, it is said, commissioned in the last war! These were fitted out by merchants, to prey upon other merchants, who had never done them any injury. Is there probably any one of those privateering merchants of London, who were so ready to rob the merchants of Amsterdam, that would not as readily plunder another London merchant of the next street, if he could do it with the same impunity? The avidity, the *alieni appetitus* is the same; it is the fear alone of the gallows that makes the difference. How then can a nation, which, among the honestest of its people, has so many thieves by inclination, and whose government encouraged and commissioned no less than seven hundred gangs of robbers; how can such a nation have the face to condemn the crime in individuals, and
hang

hang up twenty of them in a morning? It naturally puts one in mind of a Newgate anecdote. One of the prisoners complained, that in the night somebody had taken his buckles out of his shoes. "What the devil!" says another, "have we then *thieves* amongst us? It must not be suffered. Let us search out the rogue, and pump him to death."

There is, however, one late instance of an English merchant who will not profit by such ill-gotten gain. He was, it seems, part-owner of a ship, which the other owners thought fit to employ as a letter of marque, and which took a number of French prizes. The booty being shared, he has now an agent here enquiring, by an advertisement in the Gazette, for those who suffered the loss, in order to make them, as far as in him lies, restitution. This conscientious man is a quaker. The Scotch presbyterians were formerly as tender: for
there

there is still extant an ordinance of the town-council of Edinburgh, made soon after the Reformation, “forbidding the
“purchase of prize goods, under pain
“of losing the freedom of the burgh for
“ever, with other punishment at the
“will of the magistrate; the practice of
“making prizes being contrary to good
“conscience, and the rule of treating
“Christian brethren as we would wish to
“be treated; and such goods *are not to*
“*be sold by any godly men within this*
“*burgh.*” The race of these godly men in Scotland is probably extinct, or their principles abandoned, since, as far as that nation had a hand in promoting the war against the colonies, prizes and confiscations are believed to have been a considerable motive.

It has been for some time a generally-received opinion, that a military man is not to enquire whether a war be just or unjust; he is to execute his orders. All
princes

princes who are disposed to become tyrants, must probably approve of this opinion, and be willing to establish it; but is it not a dangerous one? since, on that principle, if the tyrant commands his army to attack and destroy, not only an unoffending neighbour nation, but even his own subjects, the army is bound to obey. A negro slave, in our colonies, being commanded by his master to rob or murder a neighbour, or do any other immoral act, may refuse; and the magistrate will protect him in his refusal. The slavery then of a soldier is worse than that of a negro! A conscientious officer, if not restrained by the apprehension of its being imputed to another cause, may indeed resign, rather than be employed in an unjust war; but the private men are slaves for life; and they are perhaps incapable of judging for themselves. We can only lament their fate, and still more that of a sailor, who is often dragged by
force

force from his honest occupation, and compelled to imbrue his hands in perhaps innocent blood. But methinks it well behoves merchants (men more enlightened by their education, and perfectly free from any such force or obligation) to consider well of the justice of a war, before they voluntarily engage a gang of ruffians to attack their fellow-merchants of a neighbouring nation, to plunder them of their property, and perhaps ruin them and their families, if they yield it; or to wound, maim, and murder them, if they endeavour to defend it. Yet these things are done by Christian merchants, whether a war be just or unjust; and it can hardly be just on both sides. They are done by English and American merchants, who, nevertheless, complain of private theft, and hang by dozens the thieves they have taught by their own example.

It is high time, for the sake of humanity,
VOL. II. N

nity, that a stop were put to this enormity. The United States of America, though better situated than any European nation to make profit by privateering (most of the trade of Europe with the West Indies passing before their doors), are, as far as in them lies, endeavouring to abolish the practice, by offering, in all their treaties with other powers, an article, engaging solemnly, that, in case of future war, no privateer shall be commissioned on either side; and that unarmed merchant-ships, on both sides, shall pursue their voyages unmolested*. This will be a happy improvement

* This offer having been accepted by the late king of Prussia, a treaty of amity and commerce was concluded between that monarch and the United States, containing the following humane, philanthropic article; in the formation of which Dr. Franklin, as one of the American plenipotentiaries, was principally concerned, viz.

ART. XXIII.

If war should arise between the two contracting parties,

provement of the law of nations. The

parties, the merchants of either country, then residing in the other, shall be allowed to remain nine months to collect their debts and settle their affairs, and may depart freely, carrying off all their effects without molestation or hindrance: and all women and children, scholars of every faculty, cultivators of the earth, artisans, manufacturers, and fishermen, unarmed and inhabiting unfortified towns, villages, or places, and in general all others whose occupations are for the common subsistence and benefit of mankind, shall be allowed to continue their respective employments, and shall not be molested in their persons, nor shall their houses or goods be burnt, or otherwise destroyed, nor their fields wasted, by the armed force of the enemy, into whose power, by the events of war, they may happen to fall; but if any thing is necessary to be taken from them for the use of such armed force, the same shall be paid for at a reasonable price. And all merchant and trading vessels employed in exchanging the products of different places, and thereby rendering the necessaries, conveniences, and comforts of human life more easy to be obtained, and more general, shall be allowed to pass free and unmolested; and neither of the contracting powers shall grant or issue any commission to any private armed vessels, empowering them to take or destroy such trading vessels, or interrupt such commerce.

humane and the just cannot but wish
general success to the proposition.

With unchangeable esteem and affection,

I am, my dear friend,

Ever yours.

REMARKS CONCERNING THE SAVAGES
OF NORTH-AMERICA.

SAVAGES we call them, because their manners differ from ours, which we think the perfection of civility; they think the same of theirs.

Perhaps, if we could examine the manners of different nations with impartiality, we should find no people so rude as to be without any rules of politeness; nor any so polite as not to have some remains of rudeness.

The Indian men, when young, are hunters and warriors; when old, counsellors; for all their government is by the counsel or advice of the sages; there is no force, there are no prisons, no officers to compel obedience, or inflict punishment. Hence they generally study

oratory ; the best speaker having the most influence. The Indian women till the ground, dress the food, nurse and bring up the children, and preserve and hand down to posterity the memory of public transactions. These employments of men and women are accounted natural and honourable. Having few artificial wants, they have abundance of leisure for improvement by conversation. Our laborious manner of life, compared with theirs, they esteem slavish and base ; and the learning on which we value ourselves they regard as frivolous and useless. An instance of this occurred at the treaty of Lancaster, in Pennsylvania, anno 1744, between the government of Virginia and the Six Nations. After the principal business was settled, the commissioners from Virginia acquainted the Indians by a speech, that there was at Williamsburg a college, with a fund, for educating Indian youth ; and that if the chiefs of the
Six

Six Nations would send down half a dozen of their sons to that college, the government would take care that they should be well provided for, and instructed in all the learning of the white people. It is one of the Indian rules of politeness not to answer a public proposition the same day that it is made; they think it would be treating it as a light matter; and that they shew it respect by taking time to consider it, as of a matter important. They therefore deferred their answer till the day following; when their speaker began, by expressing their deep sense of the kindness of the Virginia government, in making them that offer; "for we know," says he, "that
" you highly esteem the kind of learn-
" ing taught in those colleges, and that
" the maintenance of our young men,
" while with you, would be very expen-
" sive to you. We are convinced, there-
" fore, that you mean to do us good by

“ your propofal ; and we thank you
“ heartily. But you who are wife muft
“ know, that different nations have dif-
“ ferent conceptions of things ; and you
“ will therefore not take it amifs, if our
“ ideas of this kind of education happen
“ not to be the fame with yours. We
“ have had fome experience of it : feve-
“ ral of our young people were formerly
“ brought up at the colleges of the
“ northern provinces ; they were in-
“ ftructed in all your fcience ; but
“ when they came back, to us they were
“ bad runners ; ignorant of every means
“ of living in the woods ; unable to
“ bear either cold or hunger ; knew
“ neither how to build a cabin, take a
“ deer, or kill an enemy ; fpoke our
“ language imperfectly ; were therefore
“ neither fit for hunters, warriors, or
“ counfellors ; they were totally good
“ for nothing. We are however not the
“ lefs obliged by your kind offer, though
“ we

“ we decline accepting it : and to shew
“ our grateful sense of it, if the gentle-
“ men of Virginia will send us a dozen
“ of their sons, we will take great care of
“ their education, instruct them in all
“ we know, and make *men* of them.”

Having frequent occasions to hold public councils, they have acquired great order and decency in conducting them. The old men sit in the foremost ranks, the warriors in the next, and the women and children in the hindmost. The business of the women is to take exact notice of what passes, imprint it in their memories, for they have no writing, and communicate it to their children. They are the records of the council, and they preserve tradition of the stipulations in treaties a hundred years back ; which when we compare with our writings we always find exact. He that would speak, rises. The rest observe a profound silence. When he has finished, and sits
down,

down, they leave him five or six minutes to recollect, that, if he has omitted any thing he intended to say, or has any thing to add, he may rise again and deliver it. To interrupt another, even in common conversation, is reckoned highly indecent. How different this is from the conduct of a polite British House of Commons, where scarce a day passes without some confusion, that makes the Speaker hearse in calling *to order*; and how different from the mode of conversation in many polite companies of Europe, where, if you do not deliver your sentence with great rapidity, you are cut off in the middle of it by the impatient loquacity of those you converse with, and never suffered to finish it!

The politeness of these savages in conversation is, indeed, carried to excess; since it does not permit them to contradict or deny the truth of what is asserted in their presence. By this means they
indeed

indeed avoid disputes ; but then it becomes difficult to know their minds, or what impressiion you make upon them. The missionaries who have attempted to convert them to Christianity, all complain of this as one of the great difficulties of their mission. The Indians hear with patience the truths of the gospel explained to them, and give their usual tokens of assent and approbation : you would think they were convinced. No such matter. It is mere civility.

A Swedish minister having assembled the chiefs of the Sasquehannah Indians, made a sermon to them, acquainting them with the principal historical facts on which our religion is founded ; such as the fall of our first parents by eating an apple ; the coming of Christ to repair the mischief ; his miracles and suffering, &c.——When he had finished, an Indian orator stood up to thank him. “ What you have told us,” says he, “ is
“ all

“all very good. It is indeed bad to
“eat apples. It is better to make
“them all into cyder. We are much
“obliged by your kindness in coming
“so far, to tell us those things which
“you have heard from your mothers.
“In return, I will tell you some of those
“we have heard from ours.

“In the beginning, our fathers had
“only the flesh of animals to subsist on ;
“and if their hunting was unsuccessful,
“they were starving. Two of our young
“hunters, having killed a deer, made a
“fire in the woods to broil some parts of
“it. When they were about to satisfy
“their hunger, they beheld a beautiful
“young woman descend from the clouds,
“and seat herself on that hill which you
“see yonder among the Blue Mountains.
“They said to each other, It is a spirit
“that perhaps has smelt our broiling
“venison, and wishes to eat of it : let
“us offer some to her. They presented
“her

“ her with the tongue : she was pleased
“ with the taste of it, and said, Your
“ kindness shall be rewarded. Come
“ to this place after thirteen moons, and
“ you shall find something that will
“ be of great benefit in nourishing you
“ and your children to the latest gene-
“ rations. They did so, and, to their
“ surprise, found plants they had never
“ seen before ; but which, from that
“ ancient time, have been constantly
“ cultivated among us, to our great
“ advantage. Where her right hand
“ had touched the ground, they found
“ maize ; where her left hand had
“ touched it they found kidney-beans ;
“ and where her backside had sat on it,
“ they found tobacco.” The good
missionary, disgusted with this idle tale,
said, “ What I delivered to you were sa-
“ cred truths ; but what you tell me is
“ mere fable, fiction, and falsehood.”
The Indian, offended, replied, “ My
“ brother,

“ brother, it seems your friends have not
“ done you justice in your education ;
“ they have not well instructed you in
“ the rules of common civility. You saw
“ that we, who understand and practise
“ those rules, believed all your stories,
“ why do you refuse to believe ours ?”

When any of them come into our towns, our people are apt to crowd round them, gaze upon them, and incommode them where they desire to be private ; this they esteem great rudeness, and the effect of the want of instruction in the rules of civility and good manners. “ We have,” say they, “ as much
“ curiosity as you, and when you come
“ into our towns, we wish for opportunities of looking at you ; but for this
“ purpose we hide ourselves behind
“ bushes where you are to pass, and
“ never intrude ourselves into your company ”

Their manner of entering one another’s

villages has likewise its rules. It is reckoned uncivil in travelling strangers to enter a village abruptly, without giving notice of their approach. Therefore, as soon as they arrive within hearing, they stop and holla, remaining there till invited to enter. Two old men usually come out to them, and lead them in. There is in every village a vacant dwelling, called the strangers' house. Here they are placed, while the old men go round from hut to hut, acquainting the inhabitants that strangers are arrived, who are probably hungry and weary; and every one sends them what he can spare of victuals, and skins to repose on. When the strangers are refreshed, pipes and tobacco are brought; and then, but not before, conversation begins, with enquiries who they are, whither bound, what news, &c. and it usually ends with offers of service; if the strangers have occasion for guides, or any necessities

ries for continuing their journey; and nothing is exacted for the entertainment.

The same hospitality, esteemed among them as a principal virtue, is practised by private persons; of which *Conrad Weiser*, our interpreter, gave me the following instance. He had been naturalized among the Six Nations, and spoke well the Mohuck language. In going through the Indian country, to carry a message from our governor to the council at *Onondaga*, he called at the habitation of *Canassetego*, an old acquaintance, who embraced him, spread furs for him to sit on, placed before him some boiled beans and venison, and mixed some rum and water for his drink. When he was well refreshed, and had lit his pipe, *Canassetego* began to converse with him; asked how he had fared the many years since they had seen each other, whence he then came, what occasioned the journey, &c. *Conrad* answered

swered all his questions; and when the discourse began to flag, the Indian, to continue it, said, "Conrad, you have lived
" long among the white people, and
" know something of their customs;
" I have been sometimes at Albany, and
" have observed, that once in seven days
" they shut up their shops, and assemble
" all in the great house; tell me what
" it is for? What do they do there?"
" They meet there," says Conrad, " to
" hear and learn *good things*." " I do
" not doubt," says the Indian, " that
" they tell you so; they have told me
" the same: but I doubt the truth of
" what they say, and I will tell you
" my reasons. I went lately to Albany
" to sell my skins and buy blankets,
" knives, powder, rum, &c. You know
" I used generally to deal with Hans
" Hanson; but I was a little inclined
" this time to try some other merchants.
" However, I called first upon Hans,
VOL. II. O " and

“ and asked him what he would give for
“ beaver. He said he could not give
“ more than four shillings a pound:
“ but, says he, I cannot talk on business
“ now; this is the day when we meet
“ together to learn *good things*, and I am
“ going to the meeting. So I thought to
“ myself, since I cannot do any business
“ to-day, I may as well go to the meeting
“ too, and I went with him. There stood
“ up a man in black, and began to talk
“ to the people very angrily. I did not
“ understand what he said; but perceiv-
“ ing that he looked much at me, and
“ at Hanson, I imagined he was angry
“ at seeing me there; so I went out,
“ sat down near the house, struck fire,
“ and lit my pipe, waiting till the meet-
“ ing should break up. I thought too
“ that the man had mentioned something
“ of beaver, and I suspected it might be
“ the subject of their meeting. So when
“ they came out I accosted my merchant.
“ Well,

“ Well, Hans, says I, I hope you have
“ agreed to give more than four shillings
“ a pound.” “ No,” says he, “ I cannot
“ give so much, I cannot give more than
“ three shillings and sixpence.” “ I then
“ spoke to several other dealers, but they
“ all sung the same song, three and six-
“ pence, three and sixpence. This made
“ it clear to me that my suspicion was
“ right; and that, whatever they pre-
“ tended of meeting to learn *good things*,
“ the real purpose was to consult how
“ to cheat Indians in the price of beaver.
“ Consider but a little, Conrad, and
“ you must be of my opinion. If they
“ met so often to learn *good things*, they
“ would certainly have learned some be-
“ fore this time. But they are still igno-
“ rant. You know our practice. If a white
“ man, in travelling through our coun-
“ try, enters one of our cabins, we all
“ treat him as I do you; we dry him if
“ he is wet, we warm him if he is cold,

“ and give him meat and drink, that he
 “ may allay his thirst and hunger ; and
 “ we spread soft furs for him to rest and
 “ sleep on : we demand nothing in re-
 “ turn *. But if I go into a white man’s
 “ house at Albany, and ask for victuals
 “ and drink, they say, Where is your
 “ money ? and if I have none, they say,
 “ Get out, you Indian dog. You see
 “ they have not yet learned those little
 “ *good things* that we need no meetings

* It is remarkable that, in all ages and countries,
 hospitality has been allowed as the virtue of those
 whom the civilized were pleased to call Barbarians.
 The Greeks celebrated the Scythians for it. The Sara-
 cens possessed it eminently ; and it is to this day the
 reigning virtue of the wild Arabs. St. Paul too,
 in the relation of his voyage and shipwreck on the
 island of Melita, says, “ The barbarous people
 “ shewed us no little kindness ; for they kindled
 “ a fire, and received us every one, because of the
 “ present rain, and because of the cold.” This
 note is taken from a small collection of Franklin’s
 papers, printed for Dilly.

“ to

“ to be instructed in, because our mo-
“ thers taught them to us when we were
“ children; and therefore it is impossible
“ their meetings should be, as they say,
“ for any such purpose, or have any
“ such effect; they are only to contrive
“ *the cheating of Indians in the price of*
“ *beaver.*”

TO MR. DUBOURG, CONCERNING THE
DISSENSIONS BETWEEN ENGLAND
AND AMERICA.

London, October 2, 1770.

I SEE with pleasure that we think pretty much alike on the subjects of English America. We of the colonies have never insisted that we ought to be exempt from contributing to the common expences necessary to support the prosperity of the empire. We only assert, that having parliaments of our own, and not having representatives in that of Great Britain, our parliaments are the only judges of what we can and what we ought to contribute in this case; and that the English parliament has no right to take our money without our consent.

In

In fact, the British empire is not a single state; it comprehends many; and though the parliament of Great Britain has arrogated to itself the power of taxing the colonies, it has no more right to do so, than it has to tax Hanover. We have the same king, but not the same legislatures.

The dispute between the two countries has already lost England many millions sterling, which it has lost in its commerce; and America has in this respect been a proportionable gainer. This commerce consisted principally of superfluities; objects of luxury and fashion, which we can well do without; and the resolution we have formed of importing no more till our grievances are redressed, has enabled many of our infant manufactures to take root; and it will not be easy to make our people abandon them in future, even should a connection more cordial than ever succeed the pre-

sent troubles.—I have, indeed, no doubt that the parliament of England will finally abandon its present pretensions, and leave us to the peaceable enjoyment of our rights and privileges.

B. FRANKLIN,

PREFERENCE OF BOWS AND ARROWS IN
WAR TO FIRE ARMS.

To Major General Lee.

Philadelphia, Feb. 11, 1776.

DEAR SIR,

THE bearer, Mons. Arundel, is directed by the congress to repair to general Schuyler, in order to be employed by him in the artillery service. He proposes to wait on you in his way, and has requested me to introduce him by a line to you. He has been an officer in the French service, as you will see by his commissions ; and professing a good will to our cause, I hope he may be useful in instructing our gunners and matrosses : perhaps he may advise in opening the nailed cannon.

I received the inclosed the other day
from

from an officer, Mr. Newland, who served in the two last wars and was known by general Gates, who spoke well of him to me when I was at Cambridge. He is desirous now of entering into your service. I have advised him to wait upon you at New York.

They still talk big in England, and threaten hard; but their language is somewhat civilier, at least not quite so disrespectful to us. By degrees they come to their senses, but too late, I fancy, for their interest.

We have got a large quantity of saltpetre, one hundred and twenty ton, and thirty more expected. Powder mills are now wanting; I believe we must set to work and make it by hand. But I still wish with you, that pikes could be introduced, and I would add bows and arrows: these were good weapons, and not wisely laid aside.

1. Because a man may shoot as truly

truly with a bow as with a common musket.

2. He can discharge four arrows in the time of charging and discharging one bullet.

3. His object is not taken from his view by the smoke of his own side.

4. A flight of arrows seen coming upon them terrifies and disturbs the enemy's attention to his business.

5. An arrow sticking in any part of a man, puts him *hors du combat* till it is extracted.

6. Bows and arrows are more easily provided every where than muskets and ammunition.

Polydore Virgil, speaking of one of our battles against the French in Edward the third's reign, mentions the great confusion the enemy was thrown into, *sagittarum nube*, from the English; and concludes, *Est res profecto dictu mirabilis, ut tantus ac potens exercitus a solis ferè Anglicis*

cis sagittariis victus fuerit ; adeo Anglus est sagittipotens, et id genus armorum valet. If so much execution was done by arrows when men wore some defensive armour, how much more might be done now that it is out of use !

I am glad you are come to New-York, but I also wish you could be in Canada. There is a kind of suspense in men's minds here at present, waiting to see what terms will be offered from England. I expect none that we can accept; and when that is generally seen, we shall be more unanimous and more decisive : then your proposed solemn league and covenant will go better down, and perhaps most of our other strong measures adopted.

I am always glad to hear from you, but I do not deserve your favours, being so bad a correspondent. My eyes will now hardly serve me to write by night, and these short days have been all taken
up

up by such variety of business that I seldom can sit down ten minutes without interruption—God give you success!

I am, with the greatest esteem,

Yours affectionately,

B. FRANKLIN.

*A Comparison of the Conduct of the Ancient
Jews and of the ANTIFEDERALISTS
in the United States of AMERICA.*

A ZEALOUS advocate for the proposed Federal Constitution in a certain public assembly said, that “ the repugnance of
“ a great part of mankind to good go-
“ vernment was such, that he believed,
“ that if an angel from heaven was to
“ bring down a constitution formed there
“ for our use, it would nevertheless meet
“ with violent opposition.” — He was re-
proved for the supposed extravagance of
the sentiment ; and he did not justify it.
— Probably it might not have immedi-
ately occurred to him that the experiment
had been tried, and that the event was
recorded in the most faithful of all his-
tories,

tories, the Holy Bible ; otherwise he might, as it seems to me, have supported his opinion by that unexceptionable authority.

The Supreme Being had been pleased to nourish up a single family, by continued acts of his attentive providence, till it became a great people ; and having rescued them from bondage by many miracles performed by his servant Moses, he personally delivered to that chosen servant, in presence of the whole nation, a constitution and code of laws for their observance ; accompanied and sanctioned with promises of great rewards, and threats of severe punishments, as the consequence of their obedience or disobedience.

This constitution, though the Deity himself was to be at its head (and it is therefore called by political writers a Theocracy), could not be carried into execution but by the means of his ministers.

Aaron and his sons were therefore commissioned to be, with Moses, the first established ministry of the new government.

One would have thought, that the appointment of men who had distinguished themselves in procuring the liberty of their nation, and had hazarded their lives in openly opposing the will of a powerful monarch who would have retained that nation in slavery, might have been an appointment acceptable to a grateful people; and that a constitution, framed for them by the Deity himself, might on that account have been secure of an universal welcome reception. Yet there were, in every one of the thirteen tribes, some discontented, restless spirits, who were continually exciting them to reject the proposed new government, and this from various motives.

Many still retained an affection for Egypt, the land of their nativity; and these,

these, whenever they felt any inconvenience or hardship, though the natural and unavoidable effect of their change of situation, exclaimed against their leaders as the authors of their trouble; and were not only for returning into Egypt, but for stoning their deliverers*.—

Those inclined to idolatry were displeased that their golden calf was destroyed. Many of the chiefs thought the new constitution might be injurious to their particular interests, that the profitable places would be *engrossed by the families and friends of Moses and Aaron*, and others equally well born excluded†.— In Josephus, and the Talmud, we learn

* Numbers, chap. xiv.

† Numbers, chap. xvi. ver. 3. “And they gathered themselves together against Moses and against Aaron, and said unto them, Ye take too much upon you, seeing all the congregations are holy, every one of them,—wherefore then lift ye up yourselves above the congregation?”

VOL. II.

P

some

some particulars, not so fully narrated in the scripture. We are there told, “ that Corah was ambitious of the priesthood; and offended that it was conferred on Aaron; and this, as he said, by the authority of Moses only, *without the consent of the people*. He accused Moses of having, by various artifices, fraudulently obtained the government, and deprived the people of their liberties; and of conspiring with Aaron to perpetuate the tyranny in their family. Thus, though Corah’s real motive was the supplanting of Aaron, he persuaded the people that he meant only the public good; and they, moved by his insinuations, began to cry out,—‘ Let us maintain the common liberty of our *respective tribes*; we have freed ourselves from the slavery imposed upon us by the Egyptians, and shall we suffer ourselves to be made slaves by Moses? If we must have a master, it
“ were

“ were better to return to Pharaoh,
 “ who at least fed us with bread and
 “ onions, than to serve this new tyrant,
 “ who by his operations has brought us
 “ into danger of famine.’ Then they
 “ called in question the *reality of his*
 “ *conference* with God; and objected to
 “ the privacy of the meetings, and the
 “ preventing any of the people from being
 “ present at the colloquies, or even ap-
 “ proaching the place, as grounds of great
 “ suspicion. They accused Moses also of
 “ *peculation*; as embezzling part of the gol-
 “ den spoons and the silver chargers, that
 “ the princes had offered at the dedication
 “ of the altar *, and the offerings of gold
 “ by the common people †, as well as
 “ most of the poll tax ‡; and Aaron
 “ they accused of pocketing much of the

* Numbers, chap. vii.

† Exodus, chapter xxxv. ver. 22.

Numbers, chap. iii. and Exodus, chap. xxx.

“ gold of which he pretended to have
 “ made a molten calf. Besides pecula-
 “ tion, they charged Moses with *ambition*;
 “ to gratify which passion, he had, they
 “ said, deceived the people, by promif-
 “ ing to bring them to a land flowing
 “ with milk and honey ; instead of doing
 “ which, he had brought them *from* such
 “ a land ; and that he thought light of all
 “ this mischief, provided he could make
 “ himself an *absolute prince* *. That, to
 “ support the new dignity with splendour
 “ in his family, the partial poll tax alrea-
 “ dy levied and given to Aaron † was to
 “ be followed by a general one ‡ which
 “ would probably be augmented from

* Numbers, chap. xvi. ver. 13. “ Is it a small
 “ thing that thou hast brought us up out of a land
 “ flowing with milk and honey, to kill us in this
 “ wilderness, except thou make thyself altogether a
 “ prince over us ?”

† Numbers, chap. iii.

‡ Exodus, chap. xxx.

“ time

“ time to time, if he were suffered to go
 “ on promulgating new laws, on pretence
 “ of new occasional revelations of the di-
 “ vine will, till their whole fortunes were
 “ devoured by that aristocracy.”

Moses denied the charge of peculation ; and his accusers were destitute of proofs to support it ; though *facts*, if real, are in their nature capable of proof. “ I
 “ have not,” said he (with holy confidence in the presence of God), “ I have not
 “ taken from this people the value of an
 “ ass, nor done them any other injury.” But his enemies had made the charge, and with some success among the populace ; for no kind of accusation is so readily made, or easily believed, by knaves, as the accusation of knavery.

In fine, no less than two hundred and fifty of the principal men “ famous in
 “ the congregation, men of renown *,”

* Numbers, chap. xvi.

heading and exciting the mob, worked them up to such a pitch of phrensy, that they called out, Stone 'em, stone 'em, and thereby secure our liberties; and let us choofe other captains that may lead us back into Egypt, in case we do not succeed in reducing the Canaanites.

On the whole, it appears that the Israelites were a people jealous of their newly acquired liberty, which jealousy was in itself no fault; but that, when they suffered it to be worked upon by artful men, pretending public good, with nothing really in view but private interest, they were led to oppose the establishment of the new constitution, whereby they brought upon themselves much inconvenience and misfortune. It farther appears from the same inestimable history, that when, after many ages, the constitution had become old and much abused, and an amendment of it was proposed, the populace, as they had
accused

accused Moses of the ambition of making himself a prince, and cried out, Stone him, stone him ; so, excited by their high-priests and scribes, they exclaimed against the Messiah, that he aimed at becoming king of the Jews, and cried, Crucify him, crucify him. From all which we may gather, that popular opposition to a public measure is no proof of its impropriety, even though the opposition be excited and headed by men of distinction.

To conclude, I beg I may not be understood to infer, that our general convention was divinely inspired when it formed the new federal constitution, merely because that constitution has been unreasonably and vehemently opposed : yet, I must own, I have so much faith in the general government of the world by Providence, that I can hardly conceive a transaction of such momentous importance to the welfare of mil-

lions now existing, and to exist in the posterity of a great nation, should be suffered to pass without being in some degree influenced, guided, and governed by that omnipotent, omnipresent and beneficent Ruler, in whom all inferior spirits live, and move, and have their being.

THE INTERNAL STATE OF AMERICA:

*Being a true Description of the Interest and
Policy of that vast Continent.*

THERE is a tradition, that, in the planting of New-England, the first settlers met with many difficulties and hardships; as is generally the case when a civilized people attempt establishing themselves in a wilderness country. Being piously disposed, they sought relief from Heaven, by laying their wants and distresses before the Lord, in frequent set days of fasting and prayer. Constant meditation and discourse on these subjects kept their minds gloomy and discontented; and, like the children of Israel, there were many disposed to return to that Egypt which persecution had induced them to abandon. At length,
when

when it was proposed in the assembly to proclaim another fast, a farmer of plain sense rose, and remarked, that the inconveniences they suffered, and concerning which they had so often wearied Heaven with their complaints, were not so great as they might have expected, and were diminishing every day as the colony strengthened; that the earth began to reward their labour, and to furnish liberally for their subsistence; that the seas and rivers were found full of fish, the air sweet, the climate healthy; and, above all, that they were there in the full enjoyment of liberty, civil and religious: he therefore thought that reflecting and conversing on these subjects would be more comfortable, as tending more to make them contented with their situation; and that it would be more becoming the gratitude they owed to the Divine Being, if, instead of a fast, they should proclaim a thanksgiving. His
advice

advice was taken ; and from that day to this they have, in every year, observed circumstances of public felicity sufficient to furnish employment for a thanksgiving day ; which is therefore constantly ordered, and religiously observed.

I see in the public newspapers of different states frequent complaints of *hard times, deadness of trade, scarcity of money, &c. &c.* It is not my intention to assert or maintain that these complaints are entirely without foundation. There can be no country or nation existing, in which there will not be some people so circumstanced as to find it hard to gain a livelihood ; people who are not in the way of any profitable trade, and with whom money is scarce, because they have nothing to give in exchange for it ; and it is always in the power of a small number to make a great clamour. But let us take a cool view of the general state of our affairs, and perhaps the prospect
will

will appear less gloomy than has been imagined.

The great business of the continent is agriculture. For one artisan, or merchant, I suppose, we have at least one hundred farmers, by far the greatest part cultivators of their own fertile lands, from whence many of them draw not only food necessary for their subsistence, but the materials of their clothing, so as to need very few foreign supplies; while they have a surplus of productions to dispose of, whereby wealth is gradually accumulated. Such has been the goodness of Divine Providence to these regions, and so favourable the climate, that, since the three or four years of hardship in the first settlement of our fathers here, a famine or scarcity has never been heard of amongst us; on the contrary, though some years may have been more, and others less plentiful, there has always been provision enough for ourselves, and
a quan-

a quantity to spare for exportation. And although the crops of last year were generally good, never was the farmer better paid for the part he can spare commerce, as the published price currents abundantly testify. The lands he possesses are also continually rising in value with the increase of population; and, on the whole, he is enabled to give such good wages to those who work for him, that all who are acquainted with the old world must agree, that in no part of it are the labouring poor so generally well fed, well clothed, well lodged, and well paid, as in the United States of America.

If we enter the cities, we find that, since the revolution, the owners of houses and lots of ground have had their interest vastly augmented in value; rents have risen to an astonishing height, and thence encouragement to increase building, which gives employment to an abundance

dance of workmen, as does also the increased luxury and splendour of living of the inhabitants thus made richer. These workmen all demand and obtain much higher wages than any other part of the world would afford them, and are paid in ready money. This rank of people therefore do not, or ought not, to complain of hard times; and they make a very considerable part of the city inhabitants.

At the distance I live from our American fisheries, I cannot speak of them with any degree of certainty; but I have not heard that the labour of the valuable race of men employed in them is worse paid, or that they meet with less success, than before the revolution. The whale-men indeed have been deprived of one market for their oil; but another, I hear, is opening for them, which it is hoped may be equally advantageous; and the demand is constantly increasing
for

for their spermaceti candles, which therefore bear a much higher price than formerly.

There remain the merchants and shopkeepers. Of these, though they make but a small part of the whole nation, the number is considerable, too great indeed for the business they are employed in; for the consumption of goods in every country has its limits; the faculties of the people, that is, their ability to buy and pay, are equal only to a certain quantity of merchandize. If merchants calculate amiss on this proportion, and import too much, they will of course find the sale dull for the overplus, and some of them will say that trade languishes. They should, and doubtless will, grow wiser by experience, and import less. If too many artificers in town, and farmers from the country, flattering themselves with the idea of leading easier lives, turn shopkeepers, the whole natural quantity
of

of that business divided among them all may afford too small a share for each, and occasion complaints that trading is dead; these may also suppose that it is owing to scarcity of money, while, in fact, it is not so much from the fewness of buyers, as from the excessive number of sellers, that the mischief arises; and, if every shopkeeping farmer and mechanic would return to the use of his plough and working tools, there would remain of widows, and other women, shopkeepers sufficient for the business, which might then afford them a comfortable maintenance.

Whoever has travelled through the various parts of Europe, and observed how small is the proportion of people in affluence or easy circumstances there, compared with those in poverty and misery; the few rich and haughty landlords, the multitude of poor, abject, rack-rented, tythe-paying tenants, and half-paid

paid and half-starved ragged labourers; and views here the happy mediocrity that so generally prevails throughout these states, where the cultivator works for himself, and supports his family in decent plenty; will, methinks, see abundant reason to bless Divine Providence for the evident and great difference in our favour, and be convinced that no nation known to us enjoys a greater share of human felicity.

It is true, that in some of the states there are parties and discords; but let us look back, and ask if we were ever without them? Such will exist wherever there is liberty; and perhaps they help to preserve it. By the collision of different sentiments, sparks of truth are struck out, and political light is obtained. The different factions which at present divide us aim all at the public good; the differences are only about the various modes of promoting it. Things, actions,

measures, and objects of all kinds, present themselves to the minds of men in such a variety of lights, that it is not possible we should all think alike at the same time on every subject, when hardly the same man retains at all times the same ideas of it. Parties are therefore the common lot of humanity ; and ours are by no means more mischievous or less beneficial than those of other countries, nations, and ages, enjoying in the same degree the great blessing of political liberty.

Some indeed among us are not so much grieved for the present state of our affairs, as apprehensive for the future. The growth of luxury alarms them, and they think we are from that alone in the high road to ruin. They observe, that no revenue is sufficient without œconomy, and that the most plentiful income of a whole people from the natural productions of their country may be dissipated

dissipated in vain and needless expences, and poverty be introduced in the place of affluence.—This may be possible. It however rarely happens: for there seems to be in every nation a greater proportion of industry and frugality, which tend to enrich, than of idleness and prodigality, which occasion poverty; so that upon the whole there is a continual accumulation. Reflect what Spain, Gaul, Germany, and Britain were in the time of the Romans, inhabited by people little richer than our savages; and consider the wealth they at present possess, in numerous well-built cities, improved farms, rich moveables, magazines stocked with valuable manufactures, to say nothing of plate, jewels, and coined money; and all this, notwithstanding their bad, wasteful, plundering governments, and their mad destructive wars; and yet luxury and extravagant living have never suffered much restraint in those countries. Then

consider the great proportion of industrious frugal farmers inhabiting the interior parts of these American states, and of whom the body of our nation consists, and judge whether it is possible that the luxury of our sea-ports can be sufficient to ruin such a country.—If the importation of foreign luxuries could ruin a people, we should probably have been ruined long ago; for the British nation claimed a right, and practised it, of importing among us not only the superfluities of their own production, but those of every nation under heaven; we bought and consumed them, and yet we flourished and grew rich. At present our independent governments may do what we could not then do, discourage by heavy duties, or prevent by heavy prohibitions, such importations, and thereby grow richer; if, indeed, which may admit of dispute, the desire of adorning ourselves with fine clothes, possessing
fine

fine furniture, with elegant houses, &c. is not, by strongly inciting to labour and industry, the occasion of producing a greater value than is consumed in the gratification of that desire.

The agriculture and fisheries of the United States are the great sources of our increasing wealth. He that puts a seed into the earth is recompensed, perhaps, by receiving forty out of it ; and he who draws a fish out of our water, draws up a piece of silver.

Let us (and there is no doubt but we shall) be attentive to these, and then the power of rivals, with all their restraining and prohibiting acts, cannot much hurt us. We are sons of the earth and seas, and, like Antæus in the fable, if in wrestling with a Hercules we now and then receive a fall, the touch of our parents will communicate to us fresh strength and vigour to renew the contest.

INFORMATION TO THOSE WHO WOULD
REMOVE TO AMERICA.

MANY persons in Europe having, directly or by letters, expressed to the writer of this, who is well acquainted with North-America, their desire of transporting and establishing themselves in that country ; but who appear to him to have formed, through ignorance, mistaken ideas and expectations of what is to be obtained there ; he thinks it may be useful, and prevent inconvenient, expensive, and fruitless removals and voyages of improper persons, if he gives some clearer and truer notions of that part of the world than appear to have hitherto prevailed.

He finds it is imagined by numbers, that the inhabitants of North-America
are

are rich, capable of rewarding, and disposed to reward, all sorts of ingenuity; that they are at the same time ignorant of all the sciences, and consequently that strangers, possessing talents in the belles-lettres, fine arts, &c. must be highly esteemed, and so well paid as to become easily rich themselves: that there are also abundance of profitable offices to be disposed of, which the natives are not qualified to fill; and that having few persons of family among them, strangers of birth must be greatly respected, and of course easily obtain the best of those offices, which will make all their fortunes: that the governments, too, to encourage emigrations from Europe, not only pay the expence of personal transportation, but give lands gratis to strangers, with negroes to work for them, utensils of husbandry, and stocks of cattle. These are all wild imaginations; and those who go to America with expectations founded

upon them, will surely find themselves disappointed.

The truth is, that, though there are in that country few people so miserable as the poor of Europe, there are also very few that in Europe would be called rich ; it is rather a general happy mediocrity that prevails. There are few great proprietors of the soil, and few tenants : most people cultivate their own lands, or follow some handicraft or merchandise ; very few rich enough to live idly upon their rents or incomes, or to pay the high prices given in Europe for painting, statues, architecture, and the other works of art that are more curious than useful. Hence the natural geniuses that have arisen in America with such talents, have uniformly quitted that country for Europe, where they can be more suitably rewarded. It is true that letters and mathematical knowledge are in esteem there, but they are at the same time
more

more common than is apprehended ; there being already existing nine colleges, or universities, viz. four in New-England, and one in each of the provinces of New-York, New-Jersey, Pennsylvania, Maryland, and Virginia, all furnished with learned professors ; besides a number of smaller academies : these educate many of their youth in the languages, and those sciences that qualify men for the professions of divinity, law, or physic. Strangers, indeed, are by no means excluded from exercising those professions ; and the quick increase of inhabitants every where gives them a chance of employ, which they have in common with the natives. Of civil offices, or employments, there are few ; no superfluous ones as in Europe ; and it is a rule established in some of the states, that no office should be so profitable as to make it desirable. The 36th article of the constitution of Pennsylvania

nia

nia runs expressly in these words : “ As
“ every freeman, to preserve his indepen-
“ dence (if he has not a sufficient estate),
“ ought to have some profession, calling,
“ trade, or farm, whereby he may ho-
“ nestly subsist, there can be no necessity
“ for, nor use in, establishing offices of
“ profit ; the usual effects of which are
“ dependence and servility, unbecoming
“ freemen, in the possessors and ex-
“ pectants ; faction, contention, corrup-
“ tion and disorder among the peo-
“ ple. Wherefore, whenever an office,
“ through increase of fees or otherwise,
“ becomes so profitable as to occasion
“ many to apply for it, the profits ought
“ to be lessened by the legislature.”

These ideas prevailing more or less in all the United States, it cannot be worth any man's while, who has a means of living at home, to expatriate himself in hopes of obtaining a profitable civil office in America ; and as to military offices, they

they are at an end with the war, the armies being disbanded. Much less is it advisable for a person to go thither, who has no other quality to recommend him but his birth. In Europe it has indeed its value ; but it is a commodity that cannot be carried to a worse market than to that of America, where people do not enquire concerning a stranger, *What is he ?* but *What can he do ?* If he has any useful art, he is welcome ; and if he exercises it, and behaves well, he will be respected by all that know him ; but a mere man of quality, who on that account wants to live upon the public by some office or salary, will be despised and disregarded. The husbandman is in honour there, and even the mechanic, because their employments are useful. The people have a saying, that God Almighty is himself a mechanic, the greatest in the universe ; and he is respected and
admired

admired more for the variety, ingenuity, and utility of his handiworks, than for the antiquity of his family. They are pleased with the observation of a negro, and frequently mention it, that Boccorra (meaning the white man) make de black man workee, make de horse workee, make de ox workee, make ebery ting workee; only de hog. He de hog, no workee; he eat, he drink, he walk about, he go to sleep when he please, he libb like a gentleman. According to these opinions of the Americans, one of them would think himself more obliged to a genealogist, who could prove for him that his ancestors and relations for ten generations had been ploughmen, smiths, carpenters, turners, weavers, tanners, or even shoemakers, and consequently that they were useful members of society, than if he could only prove that they were gentlemen, doing nothing
of

of value, but living idly on the labour of others, mere *fruges consumere nati**, and otherwise good for nothing, till by their death their estates, like the carcase of the negro's gentleman-hog, come to be cut up.

With regard to encouragements for strangers from government, they are really only what are derived from good laws and liberty. Strangers are welcome because there is room enough for them all, and therefore the old inhabitants are not jealous of them; the laws protect them sufficiently, so that they have no need of the patronage of great men; and every one will enjoy securely the profits of his industry. But if he does not bring a fortune with him, he must work and be industrious to live. One or two years residence gives him all the rights of

* born

Merely to eat up the corn. WATTS.

a citizen;

a citizen ; but the government does not at present, whatever it may have done in former times, hire people to become settlers, by paying their passages, giving land, negroes, utensils, stock, or any other kind of emolument whatsoever. In short, America is the land of labour, and by no means what the English call *Lubberland*, and the French *Pays de Cocagne*, where the streets are said to be paved with half-peck loaves, the houses tiled with pancakes, and where the fowls fly about ready roasted, crying, *Come eat me !*

Who then are the kind of persons to whom an emigration to America may be advantageous ? And what are the advantages they may reasonably expect ?

Land being cheap in that country, from the vast forests still void of inhabitants, and not likely to be occupied in an age to come, insomuch that the propriety of an hundred acres of fertile soil full of

wood may be obtained near the frontiers, in many places, for eight or ten guineas, hearty young labouring men, who understand the husbandry of corn and cattle, which is nearly the same in that country as in Europe, may easily establish themselves there. A little money saved of the good wages they receive there while they work for others, enables them to buy the land and begin their plantation, in which they are assisted by the good-will of their neighbours, and some credit. Multitudes of poor people from England, Ireland, Scotland, and Germany, have by this means in a few years become wealthy farmers, who in their own countries, where all the lands are fully occupied, and the wages of labour low, could never have emerged from the mean condition wherein they were born.

From the salubrity of the air, the healthiness of the climate, the plenty of
good

good provisions, and the encouragement to early marriages by the certainty of subsistence in cultivating the earth, the increase of inhabitants by natural generation is very rapid in America, and becomes still more so by the accession of strangers: hence there is a continual demand for more artisans of all the necessary and useful kinds, to supply those cultivators of the earth with houses, and with furniture and utensils of the grosser sorts, which cannot so well be brought from Europe. Tolerably good workmen in any of those mechanic arts are sure to find employ, and to be well paid for their work; there being no restraints preventing strangers from exercising any art they understand, nor any permission necessary. If they are poor, they begin first as servants or journeymen; and if they are sober, industrious, and frugal, they soon become masters, establish themselves in business, marry, raise

raise families, and become respectable citizens.

Also, persons of moderate fortunes and capitals, who, having a number of children to provide for, are desirous of bringing them up to industry, and to secure estates for their posterity, have opportunities of doing it in America, which Europe does not afford. There they may be taught and practise profitable mechanic arts, without incurring disgrace on that account; but on the contrary acquiring respect by such abilities. There small capitals laid out in lands, which daily become more valuable by the increase of people, afford a solid prospect of ample fortunes thereafter for those children. The writer of this has known several instances of large tracts of land, bought on what was then the frontier of Pennsylvania, for ten pounds per hundred acres, which, after twenty years, when the settlements had

VOL. II. R been

been extended far beyond them, sold readily, without any improvement made upon them, for three pounds per acre. The acre in America is the same with the English acre, or the acre of Normandy.

Those who desire to understand the state of government in America would do well to read the constitutions of the several states, and the articles of confederation that bind the whole together for general purposes, under the direction of one assembly, called the Congress. These constitutions have been printed by order of Congress, in America; two editions of them have also been printed in London; and a good translation of them into French has lately been published at Paris.

Several of the princes of Europe, of late, from an opinion of advantage to arise by producing all commodities and manufactures within their
own

own dominions, so as to diminish or render useless their importations, have endeavoured to entice workmen from other countries, by high salaries, privileges, &c. Many persons pretending to be skilled in various great manufactures, imagining that America must be in want of them, and that the Congress would probably be disposed to imitate the princes above mentioned, have proposed to go over, on condition of having their passages paid, lands given, salaries appointed, exclusive privileges for terms of years, &c. Such persons, on reading the articles of confederation, will find that the Congress have no power committed to them, or money put into their hands, for such purposes; and that if any such encouragement is given, it must be by the government of some separate state. This, however, has rarely been done in America; and when it has been done, it has rarely succeeded, so as to establish

a manufacture which the country was not yet so ripe for as to encourage private persons to set it up ; labour being generally too dear there, and hands difficult to be kept together, every one desiring to be a master, and the cheapness of land inclining many to leave trades for agriculture. Some indeed have met with success, and are carried on to advantage ; but they are generally such as require only a few hands, or wherein great part of the work is performed by machines. Goods that are bulky, and of so small value as not well to bear the expence of freight, may often be made cheaper in the country than they can be imported ; and the manufacture of such goods will be profitable wherever there is a sufficient demand. The farmers in America produce indeed a good deal of wool and flax : and none is exported, it is all worked up ; but it is in the way of domestic manufacture, for the use of the family.

The

The buying up quantities of wool and flax, with the design to employ spinners, weavers, &c. and form great establishments, producing quantities of linen and woollen goods for sale, has been several times attempted in different provinces; but those projects have generally failed, goods of equal value being imported cheaper. And when the governments have been solicited to support such schemes by encouragements, in money, or by imposing duties on importation of such goods, it has been generally refused, on this principle, that if the country is ripe for the manufacture, it may be carried on by private persons to advantage; and if not, it is a folly to think of forcing nature. Great establishments of manufacture require great numbers of poor to do the work for small wages; those poor are to be found in Europe, but will not be found in America, till the lands are all taken up and cultivated, and the

excess of people who cannot get land want employment. The manufacture of silk, they say, is natural in France, as that of cloth in England, because each country produces in plenty the first material: but if England will have a manufacture of silk, as well as that of cloth, and France of cloth as well as that of silk, these unnatural operations must be supported by mutual prohibitions, or high duties on the importation of each other's goods; by which means the workmen are enabled to tax the home consumer by greater prices, while the higher wages they receive make them neither happier nor richer, since they only drink more and work less. Therefore the governments in America do nothing to encourage such projects. The people, by this means, are not imposed on either by the merchant or mechanic: if the merchant demands too much profit on imported shoes, they buy of the shoemaker;

maker; and if he asks too high a price, they take them of the merchant: thus the two professions are checks on each other. The shoemaker, however, has, on the whole, a considerable profit upon his labour in America, beyond what he had in Europe, as he can add to his price a sum nearly equal to all the expences of freight and commission, risque or insurance, &c. necessarily charged by the merchant. And the case is the same with the workmen in every other mechanic art. Hence it is, that artisans generally live better and more easily in America than in Europe; and such as are good œconomists make a comfortable provision for age, and for their children. Such may, therefore, remove with advantage to America.

In the old long-settled countries of Europe, all arts, trades, professions, farms, &c. are so full, that it is difficult for a poor man who has children, to

place them where they may gain, or learn to gain, a decent livelihood. The artisans, who fear creating future rivals in business, refuse to take apprentices, but upon conditions of money, maintenance, or the like, which the parents are unable to comply with. Hence the youth are dragged up in ignorance of every gainful art, and obliged to become soldiers, or servants, or thieves, for a subsistence. In America, the rapid increase of inhabitants takes away that fear of rivalry, and artisans willingly receive apprentices from the hope of profit by their labour, during the remainder of the time stipulated, after they shall be instructed. Hence it is easy for poor families to get their children instructed; for the artisans are so desirous of apprentices, that many of them will even give money to the parents, to have boys from ten to fifteen years of age bound apprentices to them, till the age
of

of twenty-one; and many poor parents have by that means, on their arrival in the country, raised money enough to buy land sufficient to establish themselves, and to subsist the rest of their family by agriculture. These contracts for apprentices are made before a magistrate, who regulates the agreement according to reason and justice; and having in view the formation of a future useful citizen, obliges the master to engage by a written indenture, not only that, during the time of service stipulated, the apprentice shall be duly provided with meat, drink, apparel, washing, and lodging, and at its expiration with a complete new suit of clothes, but also that he shall be taught to read, write, and cast accounts; and that he shall be well instructed in the art or profession of his master, or some other, by which he may afterwards gain a livelihood, and be able in his turn to raise a family. A

copy

copy of this indenture is given to the apprentice or his friends, and the magistrate keeps a record of it, to which recourse may be had, in case of failure by the master in any point of performance: This desire among the masters to have more hands employed in working for them, induces them to pay the passages of young persons, of both sexes, who, on their arrival, agree to serve them one, two, three, or four years; those who have already learned a trade, agreeing for a shorter term, in proportion to their skill, and the consequent immediate value of their service; and those who, have none, agreeing for a longer term, in consideration of being taught an art their poverty would not permit them to acquire in their own country.

The almost general mediocrity of fortune that prevails in America, obliging its people to follow some business for subsistence, those vices that arise usually from

from idleness, are in a great measure prevented. Industry and constant employment are great preservatives of the morals and virtue of a nation. Hence bad examples to youth are more rare in America, which must be a comfortable consideration to parents. To this may be truly added, that serious religion, under its various denominations, is not only tolerated, but respected and practised. Atheism is unknown there; infidelity rare and secret; so that persons may live to a great age in that country without having their piety shocked by meeting with either an atheist or an infidel. And the Divine Being seems to have manifested his approbation of the mutual forbearance and kindness with which the different sects treat each other, by the remarkable prosperity with which he has been pleased to favour the whole country.

FINAL SPEECH OF DR. FRANKLIN IN
THE LATE FEDERAL CONVENTION *.

MR. PRESIDENT,

I CONFESS that I do not entirely approve of this constitution at present: but, Sir, I am not sure I shall never approve it: for having lived long, I have experienced many instances of being obliged by better information, or fuller consideration, to change opinions even on important subjects, which I once thought right, but found to be otherwise. It is, therefore, that the older I grow, the more apt I am to doubt my own

* Our reasons for ascribing this speech to Dr. Franklin, are its internal evidence, and its having appeared with his name during his life-time, uncontradicted, in an American periodical publication.
judgment,

judgment, and to pay more respect to the judgment of others. Most men, indeed, as well as most sects in religion, think themselves in possession of all truth, and that whenever others differ from them, it is so far error. Steel, a protestant, in a dedication, tells the pope, that “the only difference between our two
“ churches, in their opinions of the cer-
“ tainty of their doctrines, is, the Romish
“ church is infallible, and the church
“ of England never in the wrong.” But, though many private persons think almost as highly of their own infallibility as of that of their sect, few express it so naturally as a certain French lady, who, in a little dispute with her sister, said, I don’t know how it happens, sister, but I meet with nobody but myself that is always in the right. *Il n’y a que moi qui a toujours raison.* In these sentiments, Sir, I agree to this constitution, with all its faults, if they are such ; because I
think

think a general government necessary for us, and there is no form of government but what may be a blessing, if well administered; and I believe farther, that this is likely to be well administered for a course of years, and can only end in despotism, as other forms have done before it, when the people shall become so corrupted as to need despotic government, being incapable of any other. I doubt, too, whether any other convention we can obtain, may be able to make a better constitution. For when you assemble a number of men, to have the advantage of their joint wisdom, you inevitably assemble with those men all their prejudices, their passions, their errors of opinion, their local interests, and their selfish views. From such an assembly can a perfect production be expected? It therefore astonishes me, Sir, to find this system approaching so near to perfection as it does; and I think it will astonish

our enemies, who are waiting with confidence to hear that our councils are confounded, like those of the builders of Babylon, and that our states are on the point of separation, only to meet hereafter for the purpose of cutting each other's throats.

Thus I consent, Sir, to this constitution, because I expect no better, and because I am not sure that this is not the best. The opinions I have had of its errors, I sacrifice to the public good. I have never whispered a syllable of them abroad. Within these walls they were born ; and here they shall die. If every one of us, in returning to our constituents, were to report the objections he has had to it, and endeavour to gain partisans in support of them, we might prevent its being generally received, and thereby lose all the salutary effects and great advantages resulting naturally in our favour among foreign nations, as well as
among

among ourselves, from our real or apparent unanimity. Much of the strength and efficiency of any government, in procuring and securing happiness to the people, depends on opinion ; on the general opinion of the goodness of that government, as well as of the wisdom and integrity of its governors.

I hope, therefore, that for our own sakes as a part of the people, and for the sake of our posterity, we shall act heartily and unanimously in recommending this constitution, wherever our influence may extend, and turn our future thoughts and endeavours to the means of having it well administered.

On the whole, Sir, I cannot help expressing a wish, that every member of the convention, who may still have objections, would with me, on this occasion, doubt a little of his own infallibility, and, to make manifest our unanimity, put his name to this instrument.

[The

[The motion was then made for adding the last formula, viz.

Done in Convention, by the unanimous consent, &c.: which was agreed to, and added accordingly.]

SKETCH OF AN ENGLISH SCHOOL.

*For the Consideration of the Trustees of the
Philadelphia Academy.*

IT is expected that every scholar to be admitted into this school, be at least able to pronounce and divide the syllables in reading, and to write a legible hand. None to be received that are under years of age.

FIRST, OR LOWEST CLASS.

Let the first class learn the English Grammar rules, and at the same time let particular care be taken to improve them in orthography. Perhaps the latter is
best

best done by pairing the scholars; two of those nearest equal in their spelling to be put together. Let these strive for victory; each propounding ten words every day to the other to be spelled. He that spells truly most of the other's words, is victor for that day; he that is victor most days in a month, to obtain a prize, a pretty neat book of some kind, useful in their future studies. This method fixes the attention of children extremely to the orthography of words, and makes them good spellers very early. It is a shame for a man to be so ignorant of this little art, in his own language, as to be perpetually confounding words of like sound and different significations; the consciousness of which defect makes some men, otherwise of good learning and understanding, averse to writing even a common letter.

Let the pieces read by the scholars in

this class be short ; such as Croxal's fables and little stories. In giving the lesson, let it be read to them ; let the meaning of the difficult words in it be explained to them ; and let them con over by themselves before they are called to read to the master or usher ; who is to take particular care that they do not read too fast, and that they duly observe the stops and pauses. A vocabulary of the most usual difficult words might be formed for their use, with explanations ; and they might daily get a few of those words and explanations by heart, which would a little exercise their memories ; or at least they might write a number of them in a small book for the purpose, which would help to fix the meaning of those words in their minds, and at the same time furnish every one with a little dictionary for his future use.

THE SECOND CLASS

To be taught reading with attention, and with proper modulations of the voice; according to the sentiment and the subject.

Some short pieces, not exceeding the length of a Spectator, to be given this class for lessons (and some of the easier Spectators would be very suitable for the purpose). These lessons might be given every night as tasks; the scholars to study them against the morning. Let it then be required of them to give an account, first of the parts of speech, and construction of one or two sentences. This will oblige them to recur frequently to their grammar, and fix its principal rules in their memory. Next, of the intention of the writer, or the scope of the piece, the meaning of each sentence, and of every uncommon word. This would early acquaint them with the

S 3 meaning

meaning and force of words, and give them that most necessary habit, of reading with attention.

The master then to read the piece with the proper modulations of voice, due emphasis, and suitable action, where action is required ; and put the youth on imitating his manner.

Where the author has used an expression not the best, let it be pointed out ; and let his beauties be particularly remarked to the youth.

Let the lessons for reading be varied, that the youth may be made acquainted with good styles of all kinds in prose and verse, and the proper manner of reading each kind—sometimes a well-told story, a piece of a sermon, a general's speech to his soldiers, a speech in a tragedy, some part of a comedy, an ode, a satire, a letter, blank verse, Hudibrastic, heroic, &c. But let such lessons be chosen for reading, as contain some useful instruction,

tion, whereby the understanding or morals of the youth may at the same time be improved.

It is required that they should first study and understand the lessons, before they are put upon reading them properly; to which end each boy should have an English dictionary, to help him over difficulties. When our boys read English to us, we are apt to imagine they understand what they read, because we do, and because it is their mother tongue. But they often read, as parrots speak, knowing little or nothing of the meaning. And it is impossible a reader should give the due modulation to his voice, and pronounce properly, unless his understanding goes before his tongue, and makes him master of the sentiment. Accustoming boys to read aloud what they do not first understand, is the cause of those even set tones so common among readers, which, when they have once got

a habit of using, they find so difficult to correct; by which means, among fifty readers we scarcely find a good one. For want of good reading, pieces published with a view to influence the minds of men, for their own or the public benefit, lose half their force. Were there but one good reader in a neighbourhood, a public orator might be heard throughout a nation with the same advantages, and have the same effect upon his audience, as if they stood within the reach of his voice.

THE THIRD CLASS

To be taught speaking properly and gracefully; which is near akin to good reading, and naturally follows it in the studies of youth. Let the scholars of this class begin with learning the elements of rhetoric from some short system, so as to be able to give an account of the most useful tropes and figures. Let all their bad habits of speaking, all offences

offences against good grammar, all corrupt or foreign accents, and all improper phrases, be pointed out to them. Short speeches from the Roman or other history, or from the parliamentary debates, might be got by heart, and delivered with the proper action, &c. Speeches and scenes in our best tragedies and comedies (avoiding every thing that could injure the morals of youth) might likewise be got by rote, and the boys exercised in delivering or acting them; great care being taken to form their manner after the truest models.

For their farther improvement, and a little to vary their studies, let them now begin to read history, after having got by heart a short table of the principal epochas in chronology. They may begin with Rollin's ancient and Roman histories, and proceed at proper hours, as they go through the subsequent classes, with the best histories of our own nation
and

and colonies. Let emulation be excited among the boys, by giving, weekly, little prizes, or other small encouragements, to those who are able to give the best account of what they have read, as to times, places, names of persons, &c. This will make them read with attention, and imprint the history well in their memories. In remarking on the history, the master will have fine opportunities of instilling instruction of various kinds, and improving the morals, as well as the understandings, of youth.

The natural and mechanic history, contained in the *Speſtacle de la Nature*, might also be begun in this class, and continued through the subsequent classes, by other books of the same kind; for, next to the knowledge of duty, this kind of knowledge is certainly the most useful, as well as the most entertaining. The merchant may thereby be enabled better to understand many commodities in trade;

trade; the handicraftsman to improve his business by new instruments, mixtures and materials; and frequently hints are given for new manufactures, or new methods of improving land, that may be set on foot greatly to the advantage of a country.

THE FOURTH CLASS

To be taught composition. Writing one's own language well, is the next necessary accomplishment after good speaking. It is the writing-master's business to take care that the boys make fair characters, and place them straight and even in the lines: but to form their style, and even to take care that the stops and capitals are properly disposed, is the part of the English master. The boys should be put on writing letters to each other on any common occurrences, and on various subjects, imaginary business, &c. containing little stories, accounts of their
late

late reading, what parts of authors please them, and why; letters of congratulation, of compliment, of request, of thanks, of recommendation, of admonition, of consolation, of expostulation, excuse, &c. In these they should be taught to express themselves clearly, concisely and naturally, without affected words or high-flown phrases. All their letters to pass through the master's hand, who is to point out the faults, advise the corrections, and commend what he finds right. Some of the best letters published in our own language, as Sir William Temple's, those of Pope and his friends, and some others, might be set before the youth as models, their beauties pointed out and explained by the master, the letters themselves transcribed by the scholar.

Dr. Johnson's *Ethices Elementa*, or First Principles of Morality, may now be read by the scholars, and explained by
the

the master, to lay a solid foundation of virtue and piety in their minds. And as this class continues the reading of history, let them now, at proper hours, receive some farther instruction in chronology, and in that part of geography (from the mathematical master) which is necessary to understand the maps and globes. They should also be acquainted with the modern names of the places they find mentioned in ancient writers. The exercises of good reading, and proper speaking, still continued at suitable times.

FIFTH CLASS.

To improve the youth in composition, they may now, besides continuing to write letters, begin to write little essays in prose, and sometimes in verse; not to make them poets, but for this reason, that nothing acquaints a lad so speedily with variety of expression, as the necessity of finding such words and phrases as

will suit the measure, found and rhyme of verse, and at the same time well express the sentiment. These essays should all pass under the master's eye, who will point out their faults, and put the writer on correcting them. Where the judgment is not ripe enough for forming new essays, let the sentiments of a Spectator be given, and required to be clothed in the scholar's own words : or the circumstances of some good story ; the scholar to find expression. Let them be put sometimes on abridging a paragraph of a diffuse author : sometimes on dilating or amplifying what is wrote more closely. And now let Dr. Johnson's *Noetica*, or First Principles of Human Knowledge, containing a logic, or art of reasoning, &c. be read by the youth, and the difficulties that may occur to them be explained by the master. The reading of history, and the exercises of good reading and just speaking, still continued.

SIXTH CLASS.

In this class, besides continuing the studies of the preceding in history, rhetoric, logic, moral and natural philosophy, the best English authors may be read and explained; as Tillotson, Milton, Locke, Addison, Pope, Swift, the higher papers in the Spectator and Guardian, the best translations of Homer, Virgil and Horace, of Telemachus, Travels of Cyrus, &c.

Once a year let there be public exercises in the hall; the trustees and citizens present. Then let fine gilt books be given as prizes to such boys as distinguish themselves, and excel the others in any branch of learning, making three degrees of comparison: giving the best prize to him that performs best; a less valuable one to him that comes up next to the best; and another to the third. Commendations, encouragement, and
advice

advice to the rest; keeping up their hopes, that, by industry, they may excel another time. The names of those that obtain the prize, to be yearly printed in a list.

The hours of each day are to be divided and disposed in such a manner as that some classes may be with the writing-master, improving their hands; others with the mathematical master, learning arithmetic, accounts, geography, use of the globes, drawing, mechanics, &c.; while the rest are in the English school, under the English master's care.

Thus instructed, youth will come out of this school fitted for learning any business, calling, or profession, except such wherein languages are required; and though unacquainted with any ancient or foreign tongue, they will be masters of their own, which is of more immediate and general use; and withal will have attained many other valuable accomplishments:

ments : the time usually spent in acquiring those languages, often without success, being here employed in laying such a foundation of knowledge and ability, as, properly improved, may qualify them to pass through and execute the several offices of civil life, with advantage and reputation to themselves and country.

ON THE THEORY OF THE EARTH.

TO ABBÉ SOULIAVE.

Passy, September 22, 1782.

SIR,

I RETURN the papers with some corrections. I did not find coal mines under the calcareous rock in Derbyshire. I only remarked, that at the lowest part of that rocky mountain, which was in sight, there were oyster shells mixed with the stone; and part of the high county of Derby being probably as much above the level of the sea, as the coal mines of Whitehaven were below, it seemed a proof that there had been a great bouleversement in the surface of that island, some part of it having been depressed under the sea, and other parts, which had been under it,

6

being

being raised above it. Such changes in the superficial parts of the globe seemed to me unlikely to happen, if the earth were solid to the centre. I therefore imagined that the internal parts might be a fluid more dense, and of greater specific gravity than any of the solids we are acquainted with; which therefore might swim in or upon that fluid. Thus the surface of the globe would be a shell, capable of being broken and disordered by the violent movements of the fluid on which it rested. And, as air has been compressed by art so as to be twice as dense as water, in which case, if such air and water could be contained in a strong glass vessel, the air would be seen to take the lowest place, and the water to float above and upon it; and, as we know not yet the degree of density to which air may be compressed, and M. Amontons calculated, that, its density increasing as it approached the centre in the same proportion as above

the surface, it would, at the depth of leagues, be heavier than gold, possibly the dense fluid occupying the internal parts of the globe might be air compressed. And as the force of expansion in dense air when heated, is in proportion to its density ; this central air might afford another agent to move the surface, as well as be of use in keeping alive the central fires ; though, as you observe, the sudden rarefaction of water, coming into contact with those fires, may be an agent sufficiently strong for that purpose, when acting between the incumbent earth and the fluid on which it rests.

If one might indulge imagination in supposing how such a globe was formed, I should conceive, that all the elements in separate particles, being originally mixed in confusion, and occupying a great space, they would (as soon as the Almighty fiat ordained gravity, or the mutual

mutual attraction of certain parts, and the mutual repulsion of other parts, to exist) all move towards their common centre : that the air being a fluid whose parts repel each other, though drawn to the common centre by their gravity, would be densest towards the centre, and rarer as more remote; consequently, all bodies, lighter than the central parts of that air, and immersed in it, would recede from the centre, and rise till they arrived at that region of the air, which was of the same specific gravity with themselves, where they would rest; while other matter, mixed with the lighter air, would descend, and the two, meeting, would form the shell of the first earth, leaving the upper atmosphere nearly clear. The original movement of the parts towards their common centre would form a whirl there; which would continue in the turning of the new-formed globe upon its axis, and the greatest diameter of the shell

would be in its equator. If by any accident afterwards the axis should be changed, the dense internal fluid, by altering its form, must burst the shell, and throw all its substance into the confusion in which we find it. I will not trouble you at present with my fancies concerning the manner of forming the rest of our system. Superior beings smile at our theories, and at our presumption in making them. I will just mention that your observation of the ferruginous nature of the lava, which is thrown out from the depths of our volcanoes, gave me great pleasure. It has long been a supposition of mine, that the iron contained in the substance of the globe has made it capable of becoming, as it is, a great magnet; that the fluid of magnetism exists perhaps in all space; so that there is a magnetical North and South of the universe, as well as of this globe; and that if it were possible for a man to fly from star to star, he
might

might govern his course by the compass ; that it was by the power of this general magnetism this globe became a particular magnet. In soft or hot iron the fluid of magnetism is naturally diffused equally : when within the influence of a magnet, it is drawn to one end of the iron, made denser there and rarer at the other. While the iron continues soft and hot, it is only a temporary magnet : if it cools or grows hard in that situation, it becomes a permanent one, the magnetic fluid not easily resuming its equilibrium. Perhaps it may be owing to the permanent magnetism of this globe, which it had not at first, that its axis is at present kept parallel to itself, and not liable to the changes it formerly suffered, which occasioned the rupture of its shell, the submersions and emersions of its lands, and the confusion of its seasons. The present polar and equatorial diameters differing from each other near ten leagues, it is easy to

conceive, in case some power should shift the axis gradually, and place it in the present equator, and make the new equator pass through the present poles, what a sinking of the waters would happen in the present equatorial regions, and what a rising in the present polar regions; so that vast tracts would be discovered that now are under water, and others covered that now are dry, the water rising and sinking in the different extremes near five leagues! Such an operation as this possibly occasioned much of Europe, and among the rest this mountain of Passy on which I live, and which is composed of limestone, rock and sea-shells, to be abandoned by the sea, and to change its ancient climate, which seems to have been a hot one. The globe being now become a perfect magnet, we are perhaps safe from any future change of its axis. But we are still subject to the accidents on the surface, which are occasioned by a wave in the internal ponder-

ous fluid: and such a wave is produced by the sudden violent explosion you mention, happening from the junction of water and fire under the earth, which not only lifts the incumbent earth that is over the explosion, but, impressing with the same force the fluid under it, creates a wave that may run a thousand leagues, lifting, and thereby shaking successively, all the countries under which it passes. I know not whether I have expressed myself so clearly, as not to get out of your sight in these reveries. If they occasion any new enquiries, and produce a better hypothesis, they will not be quite useless. You see I have given a loose to imagination, but I approve much more your method of philosophizing, which proceeds upon actual observation, makes a collection of facts, and concludes no farther than those facts will warrant. In my present circumstances, that mode of studying the nature of the globe is out of my power,

power, and therefore I have permitted myself to wander a little in the wilds of fancy. With great esteem, I have the honour to be, Sir, &c.

B. FRANKLIN.

P. S. I have heard that chemists can by their art decompose stone and wood, extracting a considerable quantity of water from the one, and air from the other. It seems natural to conclude from this, that water and air were ingredients in their original composition: for men cannot make new matter of any kind. In the same manner may we not suppose, that when we consume combustibles of all kinds, and produce heat or light, we do not create that heat or light, we only decompose a substance which received it originally as a part of its composition? Heat may thus be considered as originally in a fluid state; but, attracted by organized bodies in their growth, becomes a
part

part of the solid. Besides this, I can conceive that, in the first assemblage of the particles of which this earth is composed, each brought its portion of the loose heat that had been connected with it, and the whole, when pressed together, produced the internal fire which still subsists.

LOOSE THOUGHTS ON AN UNIVERSAL
FLUID, ETC.

PASSY, June 25, 1784.

UNIVERSAL space, as far as we know of it, seems to be filled with a subtile fluid, whose motion, or vibration, is called light.

This fluid may possibly be the same with that which, being attracted by and entering into other more solid matter, dilates the substance, by separating the constituent particles, and so rendering some solids fluid, and maintaining the fluidity of others: of which fluid when our bodies are totally deprived, they are said to be frozen: when they have a proper quantity, they are in health, and fit to perform all their functions; it is then called natural heat: when too
much,

much, it is called fever; and when forced into the body in too great a quantity from without, it gives pain by separating and destroying the flesh, and is then called burning; and the fluid so entering and acting is called fire.

While organized bodies, animal or vegetable, are augmenting in growth, or are supplying their continual waste, is not this done by attracting and consolidating this fluid called fire, so as to form of it a part of their substance? and is it not a separation of the parts of such substance, which, dissolving its solid state, sets that subtile fluid at liberty, when it again make its appearance as fire?

For the power of man relative to matter seems limited to the dividing it, or mixing the various kinds of it, or changing its form and appearance by different compositions of it; but does not extend to the making or creating of new matter, or annihilating the old: thus,
if

if fire be an original element, or kind of matter, its quantity is fixed and permanent in the world. We cannot destroy any part of it, or make addition to it; we can only separate it from that which confines it, and so set it at liberty, as when we put wood in a situation to be burnt; or transfer it from one solid to another, as when we make lime by burning stone, a part of the fire dislodged from the wood being left in the stone. May not this fluid, when at liberty, be capable of penetrating and entering into all bodies, organized or not; quitting easily in totality those not organized; and quitting easily in part those which are; the part assumed and fixed remaining till the body is dissolved?

Is it not this fluid which keeps asunder the particles of air, permitting them to approach, or separating them more, in proportion as its quantity is diminished or augmented? Is it not the greater gravity
of

of the particles of air, which forces the particles of this fluid to mount with the matters to which it is attached, as smoke or vapour?

Does it not seem to have a great affinity with water, since it will quit a solid to unite with that fluid, and go off with it in vapour, leaving the solid cold to the touch, and the degree measurable by the thermometer?

The vapour rises attached to this fluid; but at a certain height they separate, and the vapour descends in rain, retaining but little of it, in snow or hail less. What becomes of that fluid? Does it rise above our atmosphere, and mix equally with the universal mass of the same kind? Or does a spherical stratum of it, denser, or less mixed with air, attracted by this globe, and repelled or pushed up only to a certain height from its surface, by the greater weight of air remain

remain there surrounding the globe, and proceeding with it round the sun?

In such case, as there may be a continuity or communication of this fluid through the air quite down to the earth, is it not by the vibrations given to it by the sun that light appears to us ; and may it not be, that every one of the infinitely small vibrations, striking common matter with a certain force, enter its substance, are held there by attraction, and augmented by succeeding vibrations, till the matter has received as much as their force can drive into it ?

Is it not thus that the surface of this globe is continually heated by such repeated vibrations in the day, and cooled by the escape of the heat when those vibrations are discontinued in the night, or intercepted and reflected by clouds ?

Is it not thus that fire is amassed, and
makes

makes the greatest part of the substance of combustible bodies ?

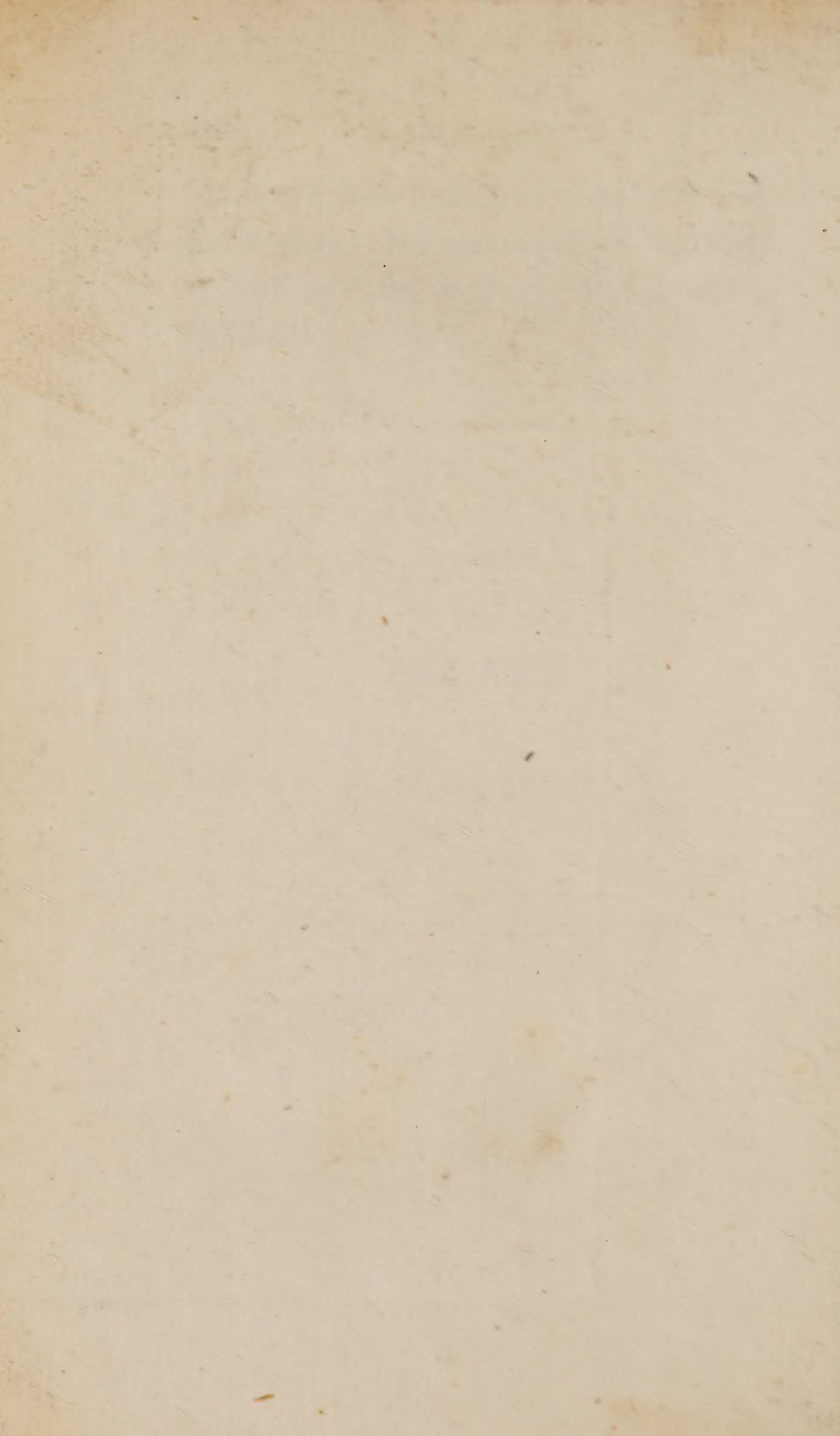
Perhaps when this globe was first formed, and its original particles took their place at certain distances from the centre, in proportion to their greater or less gravity, the fluid fire, attracted towards that centre, might in great part be obliged, as lightest, to take place above the rest, and thus form the sphere of fire above supposed, which would afterwards be continually diminishing by the substance it afforded to organized bodies ; and the quantity restored to it again by the burning or other separating of the parts of those bodies.

Is not the natural heat of animals thus produced, by separating in digestion the parts of food, and setting their fire at liberty ?

Is it not this sphere of fire which kindles the wandering globes that sometimes pass through it in our course round the

fun, have their surface kindled by it, and burst when their included air is greatly rarefied by the heat on their burning surfaces?

THE END.



36
2nd

